

Historic, Archive Document

Do not assume content reflects current scientific knowledge, policies, or practices.

SEED TRADE
1929
BUYERS GUIDE

THE SEED MERCHANTS' DIRECTORY

Published
Annually
by



1018
S. Wabash Ave.
Chicago

Grown by

LUPTON

Since 1886 we have been producers of high-grade biennial vegetable seeds to the wholesale seed trade. We believe we have profited by experience and that today we are producing higher quality stocks than ever before.

We invite correspondence from seedsmen who desire a first-class product at a reasonable price.

BEET, TURNIP, CABBAGE, KALE, ETC.

J. M. LUPTON & SON, INC.

MATTITUCK

L. I., N. Y.

Branches in Other Growing Sections

SMITH SPRAYERS

Made by the Originators of Sprayers

BANNER

Compressed Air Sprayer



DOUBLE BOTTOM - DOUBLE STRENGTH

4-gallon tank. Double seamed and well riveted. 2-inch brass pump. Made with galvanized or brass tank as ordered. Adapted for all spraying purposes, Gardens, Vines, Shrubby, Poultry Houses, Cotton, Disinfectants, Carbola, etc. Well made, high-grade sprayer and absolutely guaranteed in every detail.



**BRONX
BOTTLE
SPRAYER**

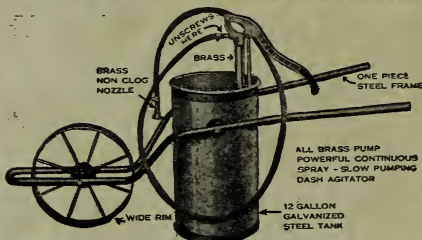
Sprayer entirely of brass, nickel plated; 16 ounce glass bottle. For spraying disinfectants, flowers, shrubby, house plants, Dupont Semesan, Moth and Fly Killing liquid. Dampens cigar wrappers, clothes before ironing.

SAVOL CLASS JAR CONTINUOUS SPRAYER



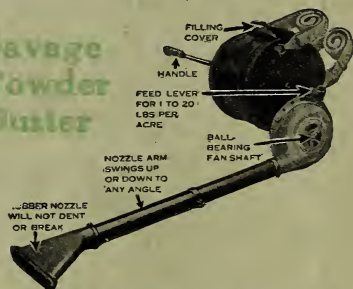
Glass jar unscrews from pump, if broken ordinary Mason fruit jar fits. Straight and angle nozzle. Sprays all insecticide, disinfectant, lacquer.

The 50 WHEELBARROW SPRAYER



Well built, strong wheelbarrow sprayer with 12 gallon galvanized or solid brass tank; entire pump, ball valves, cylinder, air chamber and nozzle solid brass; has dasher agitator; one piece steel frame; large wheel. For the gardener or greenhouse. Sprays rapidly all insecticides. Sprays trees.

**Savage
Powder
Duster**



For dusting Truck Crops, Cucumbers, Watermelons, Strawberries, Potatoes, Shrubby, Trees, Cotton, etc. Dusts everything in powder form. Ball bearings throughout, gears packed in sealed gear case. Easily operated and noiseless.

WRITE FOR CATALOG OF FULL LINE

D. B. SMITH & COMPANY

UTICA, N. Y., U. S. A.

MANUFACTURERS OF OVER 50 STYLES OF SPRAYERS — HAND, COMPRESSED AIR, LACQUER AND PAINT SPRAYERS, WHEELBARROW, BUCKET, WHITE WASH, BARREL, BOTTLE SPRAYERS AND POWDER DUSTERS, ELECTRIC SPRAYERS

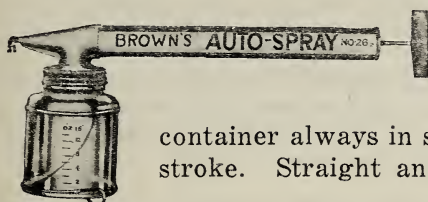


**Sprayers
Supreme!**

Reservoir of sheet brass or copper bearing galvanized steel, corrugated, which prevents denting, making an unusually strong can, easy to handle when loaded. Has drain dry and other improved patented features. Brass lever shut-off with 22-inch seamless brass extension rod.



Another New Brown's Auto-Spray



Continuous atomizer with one quart glass tank.

Easily cleaned. Content of container always in sight. Sprays on up and down stroke. Straight and angle nozzle in one price.

Brown's Whirling Showers Lawn Sprinkler

Adjustable and Variable

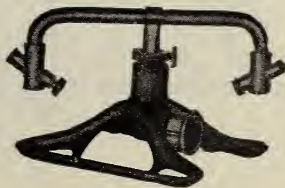
Adjustable from a light floating mist to a heavy spray. Covers a 70-foot circle.

All moving parts solid brass. Base of malleable iron. Leak proof, durable, simple in construction.

Send for Catalogue 32, "Sprayers of the Future." Hand Sprayers, Bucket, Knap-sack and Wheelbarrow Sprayers, Lacquering and Bronzing Machines.

\$2.⁷⁵

Retail Price



E. C. Brown Co.

Rochester, N. Y.

Seed Trade Buyer's Guide

Registered U. S. Patent Office

For 1929

**Compiled and Published to Promote Better Business for
Seed Merchants Everywhere.**

**Containing Classified Listings of Seed Growers, Wholesalers,
Manufacturers of Equipment, Supplies and
Side-Line Merchandise.**

**Containing Complete Provisions of the Uniform Seed Law, Tables of
Seed Exports and Imports, Tariff Rates, Planting and Spraying
Tables, Information on Sidelines and Other Data of Inter-
est to the Seed Trade. For Index Refer to Page 5.**

**It has been the endeavor of the publishers to limit the listings to
actual growers, wholesalers or manufacturers who are generally
recognized in the trade as being privileged to such
classification. For index refer to page 5.**

**The publication of this book is made possible through the
support of the advertisers whose names appear in
black face type in the directory section.**

Price \$1.00

Copyright 1929 by The Seed Trade Reporting Bureau, Inc.

PUBLISHED BY

1018 S. Wabash Ave.

CHICAGO, ILLINOIS



Landreth's Seeds

Garden and Flower Seeds
Mixed Lawn Grasses and Onion Sets

When You Buy—Buy the Best

This is our 145th year in the Seed business, we are the oldest Seed House in America. If we had not grown good Seeds, given good attention to business, good service and fair prices we would not have reached the age we have. We are growers and dealers of all varieties of Garden Seeds, Flower Seeds, Mixed Lawn Grasses and Onion Sets.

If our travelers do not call upon you, write us and we will see that they do, or if they do not call at the proper time when you wish to buy, send us a list of your wants and we will make you special quotations.

Please keep us in mind before buying your Garden Seeds, Flower Seeds, Mixed Lawn Grasses and Onion Sets for any date of shipment, write us and let us quote you.

D. LANDRETH SEED CO.

Bristol, Pennsylvania

Established 1784

LEONARD SEED CO.



Wholesale Dealers and Growers
of
GARDEN and FLOWER SEED
and ONION SETS



GENERAL OFFICES:

333-355 W. 35th Street
at Shields Ave.

CHICAGO, ILLINOIS

INDEX

REFERENCE SECTION

SEEDS

Uniform State Seed Law.....	10	Location of Seed Testing Laboratories..	30
Red Clover Seed Prices at Toledo.....	14	Addresses of Agricultural Experiment	
Range of March Clover Seed Prices at		Stations	32
Toledo	14	Field Seed Production in United States	
Alsike Clover Seed Prices at Toledo....	16	(Past Five Years)	32
Exports of Clover Seed.....	16	Weight and Measure Equivalents.....	34
Exports of Timothy Seed.....	16	Characteristics of Field Seeds.....	36
Prices of October Clover Seed at Toledo	19	Eushel Weights	38
Number of Plants to an Acre.....	19	Characteristics of Vegetable Seeds....	64
Monthly Cash Prices of Timothy Seed..	20	Vegetable Planting Table.....	66
Forage Plant Seeds Permitted Entry Un-		Helpful Hints to Vegetable Gardeners..	68
der Federal Seed Act.....	22	Imports and Prices of Vegetable Seeds..	70
Tariff Rates Now in Effect.....	24	Names of Field Seeds in Foreign Lan-	
What the Seed Verification Service		guages	94
Means	26		

SUPPLIES AND SIDELINES

Success With Incubators.....	112	Inoculation of Legumes.....	118
Poultry Diseases	114	Spraying Calendar	123

When writing any of the concerns listed herein, please use one of the stickers placed opposite the rear covers.

DIRECTORY SECTION

SEEDS

Wholesale Field Seeds.....	40	Rose Bushes	100
Foreign Field Seeds.....	56	Water Plants	100
Wholesale Garden Seeds.....	72	Onion Sets	100
Growers Garden Seeds.....	80	Plants—Flower.....	102
Growers Flower Seeds.....	87	Plants—Vegetable	102
Foreign Garden Seeds.....	88	Seeds—Miscellaneous	
Bulbs, Plants and Miscellaneous Seeds		Canary Seed	105
Bulbs	96	Lawn Grass Seed.....	105
Bulbs—Foreign Dealers	98	Pop Corn	105
Nursery Stock	98	Potato Seed	106
Cacti	98	Seed Potatoes	106
Evergreens	98	Seed Corn	106
Ferns	100	Tree Seeds	108
Fruit Trees	100	Vegetable Roots	108
Fruit—Small	100	Wild Rice	108
Grafting Wax	100	Brokers	108
Grape Vines	100	Forwarding Agents	110
Ornamentals	100	Seed Commission Firms.....	110
Perennials	100	Seed Storage and Distribution.....	110

SIDELINE MERCHANDISE

Fertilizers and Spreaders		Tools—Garden	134
Fertilizers	128	Tractors	134
Fertilizer Spreaders	128	Transplanters	136
Garden and Field Implements and		Trowels	136
Supplies	128	Weeders	136
Cultivators	128	Wheelbarrows	136
Fanning Mills	130	Greenhouse and Floral Supplies	
Drills	130	Florists' Supplies	136
Garden Hose	130	Flower Boxes	136
Garden Tractors	130	Glass	136
Grinders—Hand	130	Glass Substitute	136
Harrows	130	Greenhouse Manufacturers	136
Hoes	130	Greenhouse Material	138
Horticultural Tools	130	Hot Bed Sash	138
Plant Protectors	132	Hot Bed Supplies	138
Plant Setters	132	Labels—Plant	138
Plant Supports	132	Moss—Sphagnum	138
Planters	132	Moss—Peat	138
Pruning Implements	132	Pots—Flower	138
Rakes	132	Pot Saucers—Flower	138
Seed Thrashers	132	Raffia	140
Seeders—Drill	132	Seed and Plant Forcers.....	140
Seeders—Broadcast	132	Tree and Plant Tubs.....	140
Shovels	134	Inoculants and Plant Foods	
Sickles	134	Inoculants	140
Smut Treating Machines	134	Plant Foods	140
Soil Shredders	134		

Index continued on following page.

Lawn Implements and Supplies

Garden Hose	140
Hedge Trimmers	142
Hose Clamps	142
Hose Menders	142
Hose Nozzles	142
Lawn Edge Trimmers	142
Lawn Furniture and Decorations	142
Lawn Grass Seed	105
Lawn Mowers	142
Lawn Mower Sharpeners	142
Lawn Rollers	142
Lawn Sprinklers	142
Lime	142
Mole and Animal Traps	144
Rakes—Bamboo	144

Pets and Pet Supplies

Birds	144
Bird Cages	144
Bird Cage Stands—Metal	144
Bird Houses	144
Bird Seed and Supplies	144
Dog Foods and Supplies	144
Gold Fish and Supplies	146
Rabbits	146

Poultry Supplies

Baby Chicks	146
Baby Chick Boxes	146
Brooders	146
Brooders—Storage	146
Carbolineum	146
Charcoal—Ground Hardwood	146
Disinfectants	146
Drinking Fountains	148
Egg Cartons	148
Feed—Poultry	148
Feed Hoppers	150
Grit	150
Incubators	150
Leg Bands	150
Lice Killers	150

Marking Punches	152
Meat Scraps	152
Nest Eggs	152
Oyster Shells	152
Pigeon Supplies	152
Poultry Remedies	152
Poultry Supplies	152
Sodium Fluoride	154
Tobacco Powder	154
Worm Medicine	154

Sprayers and Spray Materials

Animal Dips	154
Crow Repellents	154
Dusters	154
Fly Repellents	156
Fumigants	156
Fungicides	156
Insecticides	156
Moth Killers	158
Pest Exterminators	158
Seed Disinfectants	160
Sprayers	160
Weed Destroyers	160

Stock Foods and Remedies

Stock Foods	160
Stock Remedies	162

Miscellaneous Side Lines

Advertising Specialties—Wood	162
Bee Supplies	162
Books on Farming and Gardening	162
Bowls—Bulb	162
Feather Flowers	162
Flowers—Artificial	162
Hanging Baskets	162
Mushroom Spawn	162
Novelties	162
Soil Testers	162
Tree Protection	164
Xmas Greens	164
Xmas Tree Holders	164

SEEDSMEN'S SUPPLIES

Accountants and Accounting Systems	164
Adv. for Seedsmen	164
Bags—Cotton or Burlap	164
Bags—Paper	164
Bag Closing Machines	164
Bag Filling Machines	164
Bag Holders	164
Bag Pilers—Conveyors	164
Bag Seals	164
Bag Stitching Machines	166
Bag Triers	166
Bean Pickers	166
Boxes—Parcel Post	166
Cartons—Paper	166
Cartons—Printed	166
Catalog Colored Covers	166
Catalog Illustrations	166
Catalog Printers	166
Cleaning Machinery	168
Color Reproductions for Seedsmen and Nurserymen	168
Commercial Seed Testing	168
Corn Graders	168
Corn Shellers	168
Cracked Corn Cleaners and Graders	168
Crushers	168
Dust Collectors	168
Envelopes	168
Feed Grinders	168
Feed Packaging Machinery	168
Germinators	168
Glazing Points	170
Grain Cleaners	170
Greenhouses	170
Hullers	170
Irrigation Systems	170

Laboratory Equipment	170
Legal Aid	170
Mixers—Seed or Feed	170
Packet Filling	170
Packet Filling Machines	170
Patent Attorney	170
Paper for Catalogs	170
Paper Mulch	170
Paper—Wrapping	170
Posters	170
Poultry Feed Machinery	170
Sample Cases	172
Sample Pans	172
Scales—Automatic	172
Scales—Counter or Platform	172
Scales—Laboratory	172
Scarifiers	172
Scoop Trucks	172
Screens	172
Seals	172
Seed Cases	172
Seed Cleaning	172
Seed Driers	172
Seed Envelope Sealers	172
Seed Packets	172
Seed Packet Display Racks	172
Seed Polishers	174
Seed Sample Envelopes	174
Seed Threshers	174
Shipping Tags	174
Store Fixtures	174
Tag Addressing Machines	174
Trade-mark Registrations	174
Trucks	174
Twine—Sewing and Tying	174
Wrapping Machines—Automatic	174

ALFRED J. BROWN SEED COMPANY

GROWERS *of* GARDEN PEAS AND BEANS

We have care-
fully chosen and
developed strains
of unusual merit

For The Wholesale American
and Export Trade

It Costs No More
To Grow or Handle
The Best. Write for
Growing Contracts
and Surplus Offers

ALFRED J. BROWN SEED COMPANY

Grand Rapids

Michigan

THE HOGUE-KELLOGG CO.

Growers for Wholesale Trade Only

Main Office: SALINAS, CALIF.

We Grow All Standard Varieties

B E A N S
P E A S

CONTRACT GROWERS

OUR AIM

“Every Bean a Seed”

TRIAL Grounds—

Salinas



A FIELD OF MORSE'S CHANTENAY CARROT IN FULL FLOWER

Growers of pure line strains of the highest quality of CARROT, CELERY, ENDIVE, LEEK, LETTUCE, ONION, PARSLEY, PARSNIP, RADISH, SALSIFY and GARDEN PEAS and POLE BEANS and choice, selected stocks of SWEET PEAS.

C. C. MORSE & CO.

WHOLESALE SEED GROWERS

SAN FRANCISCO, CALIF.

U. S. A.

LOECHNER & CO. INC.

11 WARREN ST., NEW YORK, N. Y.

IMPORT AGENTS AND GROWERS

VEGETABLE SEEDS FIELD-GRASS SEEDS

DANISH { CABBAGE
 { CAULIFLOWER
BEETS
RADISHES
BROCCOLI
ONION

BENT GRASS
POA TRIVIALIS
ORCHARD GRASS
WHITE CLOVER
RED CLOVER
HAIRY VETCH

FLOWER SEEDS

LILY OF THE VALLEY PIPS

UNIFORM STATE SEED LAW

(As agreed upon by the Association of Official Seed Analysts, the American Seed Trade Association and the Wholesale Grass Seed Dealers Association in Detroit, June 21, 1917, and as amended in Chicago in 1920 and in Toronto in December, 1921, and in Detroit in June, 1927.)

Title

AN ACT TO REGULATE THE SELLING, OFFERING OR EXPOSING FOR SALE OF AGRICULTURAL SEEDS, AND TO REPEAL ALL LAWS AND PARTS OF LAWS IN CONFLICT WITH THIS ACT.

(Note: Title and enactment clause should be worded in accordance with the requirements of each state.)

Be it enacted by the Senate and House of Representatives in General Court convened;

SECTION 1. That the term "agricultural seeds" or "agricultural seed," as used in this act, shall be defined as the seeds of Canada Blue Grass, Kentucky Blue Grass, Brome Grass, fescues, millets, tall meadow oat grass, orchard grass, red top, Italian ryegrass, kaffir corn, perennial ryegrass, sorghum, Sudan grass, timothy, alfalfa, alsike clover, crimson clover, red clover, sweet clover, white clover, Canada field peas, cowpeas, soy beans, vetches, and other grasses and forage plants, buckwheat, flax, rape, barley, field corn, oats, rye, wheat, and other cereals, which are sold, offered or exposed for sale within this state for seeding purposes within this state.

Label Requirements of Agricultural Seeds

SECTION 2. Every lot of agricultural seeds, as defined in section one of this act except as herein otherwise provided, when in bulk, packages or other containers, shall have affixed thereto, in a conspicuous place, on the exterior of the container of such agricultural seeds, a plainly written or printed tag or label in the English language, stating:

(a) Commonly accepted name of such agricultural seeds.

(b) The approximate percentage by weight of purity; meaning, the freedom of such agricultural seeds from inert matter and from other seeds distinguishable by their appearance.

(c) The approximate total percentage by weight of weed seeds; the term "weed seeds," as herein used, being defined as the noxious weed seeds listed in section 2 subsection (d) and all seeds not listed in section one as agricultural seeds.

(d) The name and approximate number per ounce of each kind of the seeds or bulblets of the following named noxious weeds which are present, singly or collectively, as follows (1) in excess of one seed or bulblet in each five grams of timothy, red top, tall meadow oat grass, orchard grass, crested dogstail, Canada blue grass, Kentucky blue grass, fescues, brome grasses, perennial and Italian rye grass, western rye grass, crimson clover, red clover, white clover, alsike clover, sweet clover, alfalfa and all other grasses and clovers not otherwise classified; (2) one in twenty-five grams of millets, rape, flax, and other seeds not specified in (1) or (3) of this sub-section; (3) one in one hundred grams of wheat, oats, rye, barley, buckwheat, vetches and other seeds as large or larger than wheat.

Noxious weed seeds or bulblets are defined as the seeds or bulblets of * * * (not more than seven seeds or bulblets should be included here).

(e) The approximate percentage of germination of such agricultural seed together with the month and year said seed was tested, provided, that the state seed commissioner shall test and publish the results of such tests as herein provided, together with the month and year such tests were made by the seed commissioner together with the date of test as shown on label.

(f) Full name and address of the vendor of such agricultural seed.

(Note: List of "agricultural seeds" (Section 1) and "noxious weeds" (Section 2-d) should be in accordance with the conditions in each state.)

Label Requirements of Mixtures of Agricultural Seeds

SECTION 3. Mixtures of agricultural seeds which contain not more than two kinds of such seeds in excess of five per cent by weight of each, when sold, offered or exposed for sale as mixtures, shall have affixed thereto, in a conspicuous place on the exterior of the container of such mixture of seeds, a plainly written or printed tag or label, in the English language, stating:

(a) That such seed is a mixture.

(b) The name and approximate percentage by weight of each kind of agricultural seed present in such mixture in excess of five (5) per cent by weight of the total mixture.

(c) Approximate percentage by weight of weed seeds as defined in Section 2-c of this Act.

(d) The name and approximate number per ounce of each kind of the seeds or bulblets of the noxious weeds listed in section 2, subsection (d) of this Act which

are present singly or collectively in excess of one seed or bulblet in each fifteen (15) grams of such mixture.

(e) Approximate percentage of germination of each kind of agricultural seed present in such mixture in excess of five (5) per cent by weight, together with the month and year said seed was tested, provided, that the state seed commissioner shall test and publish the results of such tests as herein provided, together with the month and year such tests were made by the seed commissioner together with the date of test as shown on label.

(f) Full name and address of the vendor of such mixture.

Label Requirements of Special Mixtures

SECTION 4. Special mixtures of agricultural seeds except as specified in section 3 of this Act, when sold, offered or exposed for sale as mixtures, in bulk, packages or other containers shall have affixed thereto in a conspicuous place on the exterior of the container of such mixture a plainly written or printed tag or label in the English language stating:

(a) That such seed is a mixture.

(b) The name of each kind of agricultural seed which is present in proportion of 5 per cent or more of the total mixture.

(c) The approximate total percentage by weight of weed seeds as defined in section 2-c of this Act.

(d) Approximate percentage by weight of inert matter.

(e) The name and approximate number per ounce of each kind of seeds or bulblets of noxious weeds listed in section 2, subsection (d) of this Act, which are present, singly or collectively, in excess of one seed or bulblet in each fifteen (15) grams of such mixture.

(f) Full name and address of the vendor of such mixture.

SECTION 5. Whenever the State Seed Commissioner receives information that agricultural seeds, or any mixture of the same, are being sold, offered for sale, or exposed for sale in this State in violation of any of the requirements of this Act, and is of the opinion that the interests of the public so require, he may present to the court of common pleas of the county in which is located the residence or place of business of the person, firm, or corporation selling, offering for sale, or exposing for sale such seeds, his petition for an injunction to restrain the same, and thereupon the court, being satisfied that such seeds are being so sold, offered for sale, or exposed for sale, shall issue its injunction to restrain such person, firm or corporation from selling, offering for sale, or exposing for sale such seeds.

Exemptions

SECTION 6. Agricultural seeds or mixtures of same shall be exempt from the provisions of this Act:

(a) When possessed, exposed for sale, or sold for food purposes only;

(b) When sold to merchants to be recleaned before being sold or exposed for sale for seeding purposes.

(c) When in store for the purpose of recleaning or not possessed, sold or offered for sale for seeding purposes within the State.

Duties and Authority of Enforcing Officer

SECTION 7. The duty of enforcing this Act and carrying out its provisions and requirements shall be vested in the State Seed Commissioner. The said commissioner upon notice to the seed trade of this State, through the agricultural bulletins of the department of the State Seed Commissioner, shall be empowered to adopt such reasonable "rules and regulations" as may be deemed necessary in order to secure the efficient enforcement of this Act; provided further, that the said commissioner shall maintain a laboratory with necessary equipment and may appoint such analysts, inspectors and assistants as may be necessary for the proper enforcement and carrying out of the provisions of this Act, and in his discretion, fix the salaries of said analysts, inspectors and assistants. It shall be the duty of the State Seed Commissioner in his discretion to publish, or cause to be published, the results of the examination, analysis and test of any sample of agricultural seed or mixture of such seed, drawn as provided for in section 9, together with any information he may deem advisable.

SECTION 8. The word "approximate" as used in this act shall be defined in the rule and regulations provided for in this Act, by the State Seed Commissioner, who shall be guided by the "Rules and Methods of Testing" adopted and approved by the Association of Official Seed Analysts of North America.

Inspection, Sampling and Testing

SECTION 9. It shall be the duty of said commissioner, either by himself or his duly authorized agents, to inspect, examine and make analysis of and test any agricultural seeds sold, offered or exposed for sale within this state for seeding purposes within this state, at such time and place, and to such extent as he may determine.

The commissioner, and his agents, shall have free access at all reasonable hours to any premises or structures to make examination of any such agricultural seeds, whether such seeds are upon the premises of the owner or consignee of such seeds or on the premises or in possession of any warehouse, elevator, railway or steamship company and he is hereby given authority in person or by his agents, upon notice to the dealer, his agent or the representative of any warehouse, elevator, railway or steamship company, if present, to take for analysis a composite sample of such agricultural seeds. Said sample shall be thoroughly mixed and two official samples taken therefrom, each official sample shall be securely sealed. One of these official samples shall be furnished to the vendor or party in interest in person, if present, and if not present shall be promptly forwarded to the shipper or owner and the other retained by said commissioner or agent for analysis. In case a sample drawn as provided herein upon test or analysis is found to fall below the statement on the tag or label attached to the lot from which said sample was secured, or to violate any of the provisions of this Act, the vendor or consignee of said lot of seed shall be notified and a copy of said notice mailed to the person, firm or corporation whose tag or label was found affixed thereto. (Payment for samples to be proffered in states where required by State Constitution or state law.)

Violations Defined

SECTION 10. It shall be unlawful for any person, firm or corporation to sell, offer or expose for sale within this state any agricultural seeds, or mixtures of agricultural seeds, as defined in this Act, for seeding purposes within this state without complying with the requirements of this Act, or falsely to mark or label any agricultural seeds, or to interfere in any way with the inspectors or assistants in the discharge of the duties herein named.

Violations and Prosecutions

SECTION 11. Every violation of the provisions of this Act shall be deemed a misdemeanor punishable by a fine not exceeding one hundred dollars, and if the State Seed Commissioner shall find upon examination, analysis or test, that any person, firm or corporation has violated any of the provisions of this Act, he or his duly authorized agent or agents may institute proceedings in a court of competent jurisdiction to have such person, firm or corporation convicted therefor, or the State Seed Commissioner, in his discretion, may report the results of such examination to the Attorney General, together with sworn statement of the analyst, duly acknowledged, and such other evidence of said violation as he shall deem necessary. Provided, however, that no prosecution under this Act shall be instituted except in the manner following: when the State Seed Commissioner finds that the act has been violated, he shall give notice to the person or firm in whose hands the seed was found, designating a time and place for a hearing. This hearing shall be private and the person or firm involved shall have the right to introduce evidence either in person, by agent or attorney. If, after said hearing, or without such hearing, in case said person fails or refuses to appear, the said commissioner decides that the evidence warrants prosecution, he shall proceed as herein provided.

It shall be the duty of the Attorney General, or in his discretion he may act through the Attorney of the Commonwealth of the County or City in which said violation has occurred, to institute proceedings at once against the person, or persons, firms or corporations charged with such violation.

(Note: Proceedings for violation should be instituted according to the laws of each state.)

Provisions for Free Tests

SECTION 12. Any citizen of this state shall have the privilege of submitting to the State Seed Commissioner samples of agricultural seeds for test and analysis, subject to such rules and regulations as may be adopted by said commissioner. Provided that the Seed Commissioner may by such regulations fix the maximum number of samples that may be tested free of charge and for any one citizen in any one period of time and fix charges for tests of samples submitted in excess of those tested free of charge.

SECTION 13. Be it further enacted that there is hereby appropriated annually to the State Board of Agriculture for the purpose of enforcing and carrying out the provisions of this Act the sum of.....dollars, out of the funds of the state not otherwise appropriated. Such salaries and expenses as may be necessary for the proper enforcement of the provisions of this Act shall be paid from said sum herein appropriated, by warrant upon the Auditor of Public Accounts, drawn by the State Seed Commissioner and countersigned by the President of the State Board of Agriculture and he shall keep proper vouchers on file in his office for all expenditures.

(Note: Each state should make its provisions for appropriations and expenditures of funds according to local requirements.)

SECTION 14. Chapter.....of the laws of.....and any other laws or parts of laws in conflict with this Act, are hereby repealed.

SECTION 15. This Act shall be effective on and after.....

BUYERS AND SHIPPERS OF
FIELD SEEDS



**The
 Bowman
 Seed
 Co.**

Concordia, Kan.

We aim to hit the spot you want us to hit, when you order.

California Grown Seeds

From the Heart of the Seed Growing District

We Make a Specialty of Growing the Following
 Varieties Under Contract

**BEET
 CARROT
 ONION
 BEANS**

**LETTUCE
 PARSNIP
 GARDEN PEAS
 LIMA BEANS**

Market Gardeners Strains Our Specialty

F. Lagomarsino & Sons
Seed Growers

SACRAMENTO

CALIFORNIA

German, Spanish, Italian Correspondence

RED CLOVER SEED PRICES AT TOLEDO

Low and High Cash Prices per Bushel for Prime Seed by Months												
	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
1917..	\$10.60 11.05	\$10.75 11.75	\$10.55 11.80	\$10.50 10.95	\$10.60 11.25	\$10.75 11.20	\$10.95 12.00	\$11.90 12.95	\$12.75 13.60	\$13.85 15.55	\$15.30 16.30	\$15.90 17.00
1918..	16.75 20.00	19.40 21.00	19.70 20.75	18.00 20.20	18.00 18.40	12.80 14.20	13.10 16.35	16.30 19.50	19.05 23.80	22.55 24.00	24.00 26.20	24.60 26.00
1919..	24.10 25.65	22.30 25.50	25.10 30.25	29.00 31.00	25.00 28.00	27.00 27.75	27.75 29.75	29.75 30.50	27.90 30.50	30.00 21.80	29.55 30.60	30.30 31.40
1920..	31.50 39.95	34.60 36.40	33.25 35.30	25.00 34.25	26.00 27.50	25.00 25.65	19.90 25.25	17.65 21.55	14.10 17.90	12.90 15.00	11.20 13.95	11.70 13.25
1921..	11.70 13.75	10.30 11.95	11.00 13.25	11.90 13.25	13.25 13.75	13.00 13.75	13.00 14.00	11.65 14.05	11.40 12.95	12.30 13.05	11.60 12.70	12.55 14.00
1922..	13.60 14.05	14.00 16.00	14.50 16.15	13.00 14.60	13.75 13.90	13.00 13.00	13.00 13.00	9.50 11.00	10.00 11.50	11.05 12.70	12.75 13.30	13.10 13.85
1923..	13.25 13.50	12.95 13.65	11.95 13.15	11.45 12.00	11.00 11.45	10.05 10.85	10.00 10.70	11.05 12.65	12.25 14.60	14.15 15.20	12.95 14.25	12.95 13.40
1924..	12.60 13.90	11.35 12.85	11.30 12.35	10.75 11.50	10.80 11.40	11.00 11.65	11.35 12.40	11.80 13.30	12.75 17.60	16.50 18.20	17.65 19.90	19.05 19.80
1925..	19.15 19.85	18.10 20.00	16.50 18.75	16.40 17.20	15.00 16.30	16.25 17.55	16.00 17.25	16.25 17.45	14.80 16.75	16.75 18.25	14.30 15.50 *18.50 *18.75	14.75 17.00 *18.25 *18.50
1926 {	14.85 16.00 *18.75 *20.00	14.85 15.70 *20.00 *21.00	14.25 15.40 *21.00 *21.00	14.35 14.40 *21.00 *21.00	14.35 17.50 *21.00 *21.00	17.50 17.70 *21.50 *22.00	17.50 17.75 *22.00 *22.00	17.75 19.50 † †	19.25 21.75 *21.00 *21.75	19.00 20.00 *21.00 *22.75	20.00 20.00 21.60 22.50	20.50 20.00 22.25 22.85
1927 {	20.50 21.50 *23.00 *23.50	21.50 23.00 *23.50 *24.75	16.75 17.65 *24.75 *27.00	16.75 17.40 *26.50 *27.00	13.75 16.85 *26.50 *26.50	13.00 13.90 ** **	13.90 14.25	13.75 14.00	13.75 14.50	14.00 15.50 *15.60 *17.90	15.50 16.40 *17.60 *18.40	16.30 16.40 *17.55 *18.70
1928 {	15.75 16.30 *18.05 *18.85	14.75 15.75 *16.50 *18.05	14.50 14.75 *16.65 *17.75	13.75 14.50 *16.75 *17.25	12.60 13.75 *16.50 *16.60	13.00 14.25 *16.60 *17.75	14.25 14.25 *17.75 *18.00	14.00 14.25 *17.00 *17.50	14.00 14.25 *17.50 *18.20	13.75 14.25 *18.00 *18.65	....................	....................

*Domestic red clover seed. Other quotations in November and December of 1925 and all of 1926, 1927, and 1928 are on imported seed.

†Stopped quoting cash domestic from July 22 to September 24, 1926.

**Stopped quoting cash domestic May 14, 1927.

RANGE OF MARCH CLOVER SEED PRICES AT TOLEDO

Low and High Prices per Bushel by Months

	Crop of	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.
1918	16.60	19.35	22.30	24.00	24.80	23.45	22.00	24.50
		19.50	23.25	24.00	26.10	26.25	25.85	25.00	30.25
1919	28.60	28.60	29.25	29.65	30.15	31.60	34.20	32.70
		30.50	29.80	31.25	30.50	31.40	35.70	35.42	34.25
1920	18.25	14.65	13.17	11.60	12.10	11.90	10.05	11.05
		21.25	18.60	15.90	14.40	13.35	13.90	12.10	12.95
1921	11.70	11.40	12.30	11.75	12.55	13.20	14.00	14.50
		13.95	13.30	12.95	12.75	13.35	14.25	15.95	16.15
1922	9.05	9.85	11.35	12.85	13.35	13.35	12.70	12.75
		10.30	11.70	12.80	13.50	13.90	13.65	13.50	13.05
1923	11.90	13.15	13.85	13.05	13.05	12.80	11.35	11.50
		13.40	15.20	14.60	13.90	13.60	14.05	13.05	12.35
1924	13.00	13.20	17.00	17.95	19.15	19.35	18.00	16.50
		13.65	18.50	18.50	19.95	20.00	20.10	19.85	18.45
1925	14.45	14.45	15.05	14.75	14.65	14.65	14.85	14.25
		15.35	16.05	16.00	15.50	15.20	16.10	15.75	15.40
1926	17.25	16.90	15.95	16.85	17.45	17.70	16.60	16.65
		17.75	19.20	17.25	17.70	18.00	18.50	17.85	17.65
1927	15.85	15.95	17.60	17.80	18.00	16.40	16.65
		16.80	17.75	18.50	18.70	19.00	18.00	17.75
1928	*							

*Stopped quoting March Clover Seed March 31.

JAS. S. WILSON

PARIS, KY.

Kentucky Bluegrass Seed Exclusively

Missouri and Kentucky Grown

After forty years' experience we are
able to give the best of service. Clean-
ing and handling facilities unexcelled.

Member of Farm Seed Association of North America

HALL SEED COMPANY

INCORPORATED

FIELD SEEDS

GARDEN SEEDS

ONION SETS

PROMPT SERVICE

PROMPT SERVICE

219-221 East Jefferson Street
Opposite Gardener's Market

LOUISVILLE, KY.

CORNELI SEED CO.

303 So. 7th St.

St. Louis, Mo.

BUYERS AND SELLERS

Alfalfa, Clovers, Timothy, Bluegrass, Red Top, Millets,
Sorghum Seed, Sudan, Bermuda, Cow Peas, Soja Beans,
Onion Sets, Seed Grain, Seed Corn, Etc.

Ask for Samples and Quotations

ALSIKE CLOVER SEED PRICES AT TOLEDO

High and Low Cash Prices per Bushel by Months

	Jan.	Feb.	March	April	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
1917	\$11.20 11.35	\$11.35 11.80	\$11.45 11.60	\$11.50 11.60	\$11.50 11.50	\$11.35 11.50	\$11.00 12.30	\$11.15 12.35	\$12.40 12.75	\$12.70 14.00	\$14.00 14.50	\$14.30 14.60
1918	14.70 16.60	15.25 18.00	15.25 15.90	15.25 15.50	15.00 15.25	11.25 14.50	11.25 14.50	14.50 15.50	15.75 18.50	18.05 18.50	18.55 20.00	19.45 19.75
1919	17.30 19.65	16.50 17.50	16.75 25.50	24.00 26.00	26.00 26.00	19.00 22.25	22.25 26.25	24.25 25.75	24.30 26.50	26.50 29.75	29.50 31.25	30.05 33.00
1920	32.80 36.25	34.70 36.20	34.85 36.50	27.00 36.25	22.50 30.00	24.50 26.75	21.00 25.00	17.50 21.50	15.25 18.00	16.50 18.50	15.60 18.00	16.25 17.75
1921	15.50 17.50	14.50 15.50	13.00 15.00	13.50 14.15	13.50 13.50	13.50 13.50	10.10 12.25	10.05 11.35	10.45 10.75	10.50 10.75	10.25 10.90	10.70 11.40
1922	11.40 12.00	12.00 12.65	11.50 12.50	10.50 11.50	10.50 11.50	11.50 11.75	10.25 11.75	9.50 10.25	10.00 10.25	10.05 11.00	10.45 11.50	10.65 11.00
1923	10.55 10.95	10.45 10.60	10.45 10.50	10.50 10.50	10.00 10.50	10.25 10.25	10.15 10.25	10.15 11.15	10.40 10.75	10.00 10.50	9.25 10.00	9.30 9.45
1924	8.70 9.50	8.35 8.80	8.70 9.20	8.75 9.50	9.70 10.20	9.80 10.80	10.65 10.80	10.00 10.80	10.00 12.25	12.15 12.75	12.25 13.30	12.60 13.25
1925	13.05 13.60	12.60 13.60	12.75 14.25	14.40* 15.15	.... ....	.... ....	.... ....	.... ....	.... ....	.... ....	.... ....	15.60 16.25
1926	16.00 16.50	16.50 17.00	17.00 17.00	17.00 17.00	17.00 17.00	15.00 17.00	14.50 15.50	14.50 16.25	16.50 18.75	18.00 18.50	18.25 19.75	19.75 20.85
1927	21.00 22.50	22.50 22.75	22.75 23.75	23.75 24.00	24.00 24.00	.... ....	.... ....	14.60 17.00	14.80 15.25	14.80 15.40	15.40 16.70	16.00 16.80
1928	16.20 16.30	15.95 16.25	15.00 15.95	15.00 15.45	15.00 15.00	15.00 16.25	16.25 16.50	18.75 18.75	18.75 19.75	18.75 19.75	........	........

*Cash prices not quoted after April 20, 1925.

**EXPORTS OF CLOVER SEED
(ALL KINDS)**

Years Ending June 30

Year	Pounds
1909	16,186,133
1910	6,977,685
1911	4,359,167
1912	1,874,682
1913	5,407,594
1914	4,640,852
1915	9,750,064
1916	7,116,220
1917	5,886,893
1918	9,439,314
1919	7,770,582
1920	5,061,792
1921	5,419,838
1922	4,007,233
1923	4,331,153
1924	784,471
1925	1,862,925
1926	973,109
1927	1,992,906
1928	1,838,783

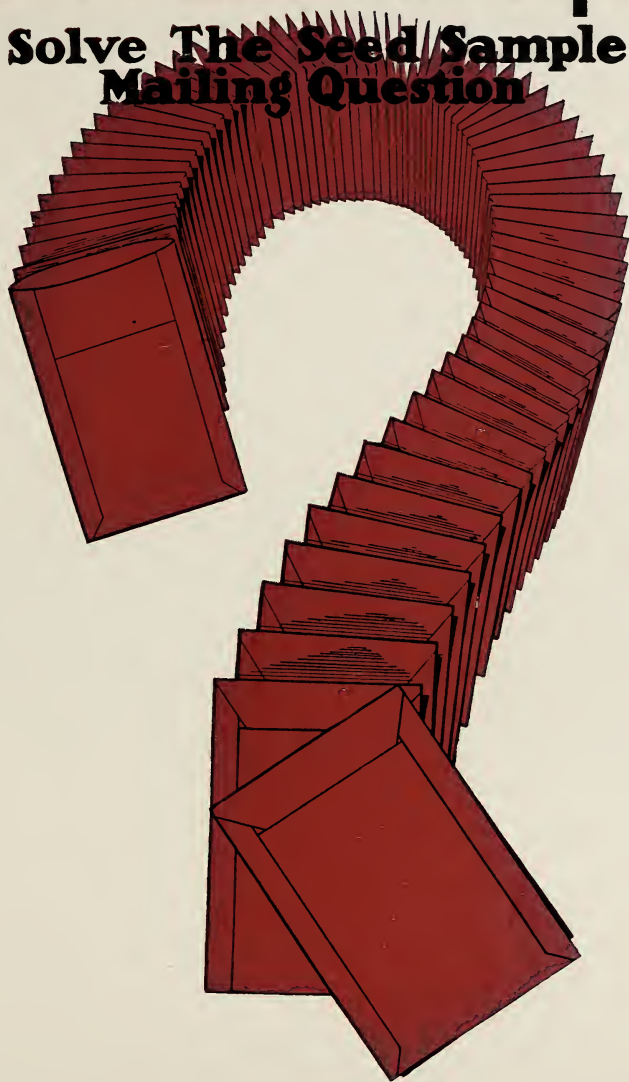
EXPORTS OF TIMOTHY SEED

Years Ending June 30

Year	Pounds
1909	26,342,842
1910	18,044,488
1911	7,893,121
1912	11,111,807
1913	3,542,705
1914	13,689,707
1915	17,646,273
1916	12,428,140
1917	15,139,913
1918	8,564,384
1919	11,673,029
1920	15,304,646
1921	14,989,518
1922	20,150,357
1923	20,131,903
1924	15,501,856
1925	16,457,687
1926	9,942,494
1927	14,060,447
1928	17,677,670

"SPEAR" Envelopes

**Solve The Seed Sample
Mailing Question**



JOHN A. HEINRICH, Inc.
ENVELOPES

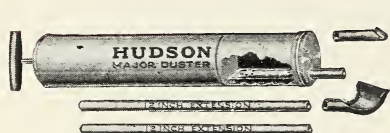
108 North Washington Avenue
MINNEAPOLIS

THE HUDSON LINE

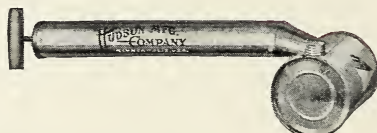
HUDSON LEADERSHIP

Hudson now offers the most comprehensive line of Sprayers in the world. A pattern for every purpose reduces your buying problem to a single source of supply.

*From Five Ounces to One Hundred Gallons
From Ten Cents to One Hundred Dollars
More Than Eighty Different Styles*



No. 665—Major



No. 452—Misty



No. 110—Perfection

Compressed Air
Sprayers

Continuous Sprayers

Quart Atomizers

Pint and Smaller
Atomizers

Paint Sprayers

Spray Hose

Dusters

Bucket Pumps

Barrel Pumps

Wheeled Types

Orchard Power Types

Accessories

*Hudson Sprayers and Garden Tools Are Sold the World Over.
They Are Improved and Developed to the Highest
Standard of Quality.*

*Seedsman who sell the Hudson line are assured
of getting up-to-the-minute merchandise, tested
and retested under practical conditions.*

HUDSON MANUFACTURING CO.

MINNEAPOLIS, MINN.

NEW YORK CITY
147 Chamber St.

PHILADELPHIA, PA.
Delaware Ave. and South St.

CHICAGO, ILL.
550 McCormick Bldg.

WRITE FOR 42-PAGE CATALOG

PRICES OCTOBER CLOVER SEED AT TOLEDO

Low and High Prices per Bushel by Months

Crop of	March	April	May	June	July	Aug.	Sept.	Oct.
1915	7.97 8.50	8.02 8.50	8.25 8.50	8.35 8.72	7.95 8.82	8.50 10.30	9.62 13.00	12.20 13.40
1916	8.47 8.77	8.45 9.00	8.50 8.95	8.72 9.22	8.92 9.50	8.50 11.20	8.90 10.05	9.45 10.90
1917	9.55 9.90	9.85 11.80	11.35 11.92	11.40 11.75	11.50 13.00	12.50 13.95	13.35 13.95	13.85 15.55
1918	19.70 20.85	18.00 20.20	18.00 18.40	12.80 14.20	13.10 16.35	16.30 19.50	19.05 23.80	22.55 24.00
1919	17.00 19.30	17.15 19.75	19.75 22.00	21.50 25.50	26.20 32.50	29.50 32.35	28.15 30.60	30.00 31.80
1920	23.00 25.25	22.00 24.25	23.40 24.25	23.50 26.25	20.15 25.95	18.20 21.75	14.60 18.55	12.90 15.60
1921	9.00 9.95	8.85 9.40	9.50 10.50	10.35 12.25	11.35 14.00	11.65 14.05	11.40 12.95	12.30 13.65
1922	11.00 12.35	11.10 12.00	11.05 11.60	10.80 11.35	10.67 11.40	8.97 10.27	9.70 11.50	11.05 12.70
1923	11.20 11.72	11.45 11.95	11.70 12.30	11.00 11.97	10.90 11.55	11.85 13.35	13.10 15.65	14.30 15.60
1924	11.92 12.65	11.75 12.40	11.85 12.40	12.00 12.65	12.35 13.60	12.50 14.30	13.90 19.00	17.30 19.00
1925	13.00 14.00	13.00 14.50	13.05 14.25	14.50 16.10	14.55 16.00	14.75 16.00	14.75 17.25	16.75 18.25
1926	15.65 16.50	15.65 16.70	16.50 19.50	19.25 20.75	19.65 21.25	19.95 22.10	20.75 22.50	21.00 22.75
1927	16.50 17.50	16.45 17.00	16.00 16.85	16.50 16.95	16.60 17.50	17.00 18.00	15.00 17.25	15.70 17.90
1928	15.00 16.15	16.25 17.75	17.30 17.75	17.75 18.75	18.65 19.10	17.30 18.65	18.00 18.60	18.30 18.65

NUMBER OF PLANTS TO AN ACRE

SET AT REGULAR DISTANCES APART

Distance apart	No. Plants	Distance apart	No. Plants	Distance apart	No. Plants
3 in. by 4 in.	522,720	3 ft. by 3 ft.	4,840	5 ft. by 5 ft.	1,742
4 in. by 4 in.	392,040	3½ ft. by 3½ ft.	3,555	5½ ft. by 5½ ft.	1,440
6 in. by 6 in.	174,240	4 ft. by 1 ft.	10,890	6 ft. by 6 ft.	1,200
1 ft. by 1 ft.	43,560	4 ft. by 2 ft.	3,630	6½ ft. by 6½ ft.	1,031
1½ ft. by 1½ ft.	19,360	4 ft. by 4 ft.	2,722	7 ft. by 7 ft.	888
2 ft. by 1 ft.	21,780	4½ ft. by 4½ ft.	2,150	8 ft. by 8 ft.	680
2 ft. by 2 ft.	10,890	5 ft. by 1 ft.	8,712	9 ft. by 9 ft.	537
2½ ft. by 2½ ft.	6,960	5 ft. by 2 ft.	4,356	10 ft. by 10 ft.	435
3 ft. by 1 ft.	14,520	5 ft. by 3 ft.	3,904	11 ft. by 11 ft.	360
3 ft. by 2 ft.	7,260	5 ft. by 4 ft.	2,178	12 ft. by 12 ft.	302

RULE—Multiply the distance in feet between the rows by the distance the plants are apart in the rows, and the product will be the number of square feet for each plant or hill; which divided into the number of square feet (43,560), will give the number of plants to the acre.

MONTHLY CASH PRICES OF TIMOTHY SEED

The following table exhibits the monthly range of prices, per 100 lbs., for cash Timothy Seed in the Chicago market during the past 21 years:

	Jan.	Feb.	March	April	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
1908.....	4.35 4.55	4.60 4.85	4.50 4.85	4.25 4.65	4.10 4.25	3.80 4.00	3.92 4.10	3.60 3.60	3.25 3.75	3.40 3.75	3.75 4.00	3.75 3.80
1909.....	3.80 4.00	3.60 3.90	3.75 3.85	3.70 3.80	3.80 4.00	3.80 3.90	3.80 3.80	3.55 3.80	3.50 4.00	3.75 4.00	3.75 3.75	3.75 3.75
1910.....	3.75 4.20	3.90 4.20	3.70 4.60	4.40 4.60	4.00 4.40	4.35 5.00	5.00 6.00	5.00 7.50	8.00 10.00	8.50 9.60	9.60 9.85	9.85 10.00
1911.....	10.00 10.70	10.50 12.50	11.25 12.50	11.75 12.00	12.00 12.00	12.00 12.00	12.00 13.25	13.50 15.00	14.50 15.50	15.25 16.00	16.00 16.25	16.00 16.25
1912.....	16.00 16.25	15.00 16.25	15.25 16.00	13.50 15.00	11.50 14.50	11.50 12.00	6.50 12.00	5.00 6.25	4.00 5.10	4.10 4.50	3.80 4.15	4.00 4.15
1913.....	4.00 4.20	3.50 4.05	3.60 3.85	3.80 3.95	3.95 4.25	4.10 5.40	5.15 5.30	5.25 5.90	5.30 5.70	5.25 5.55	5.30 5.50	5.40 5.55
1914.....	5.40 5.55	5.30 5.50	5.00 5.50	5.00 5.40	5.00 5.50	5.00 5.75	5.50 6.75	5.80 6.50	5.50 6.50	5.40 5.60	5.30 5.90	5.90 7.85
1915.....	7.75 8.00	7.30 7.75	6.65 7.40	6.90 7.25	6.50 7.25	6.75 7.50	6.00 7.50	6.40 10.00	8.00 9.25	7.75 8.50	8.00 8.50	8.00 9.00
1916.....	8.35 8.80	8.40 8.80	8.50 9.00	8.50 8.50	8.50 9.25	8.75 9.25	8.25 8.75	5.25 8.50	5.00 5.25	5.00 5.35	5.25 5.75	5.45 5.75
1917.....	5.30 5.75	5.40 5.50	5.75 5.90	6.00 7.75	6.75 8.40	7.25 8.00	7.50 8.50	7.60 8.00	6.50 8.25	6.75 8.25	7.00 8.50	7.00 7.50
1918.....	7.15 8.00	7.25 7.50	7.00 7.50	7.00 7.75	7.15 7.75	7.00 8.50	8.50 9.00	8.95 10.00	9.85 11.00	10.50 12.00	10.00 12.50	11.00 12.15
1919.....	11.40 11.75	10.00 11.25	11.00 11.50	10.75 13.50	13.00 14.00	12.60 13.00	12.65 13.25	12.50 12.70	12.00 12.75	12.00 12.75	12.10 12.80	12.00 12.50
1920.....	13.50 15.50	13.75 15.40	13.00 14.65	12.00 13.50	11.50 12.75	11.50 12.75	12.50 12.75	10.00 11.40	9.50 9.75	5.00 7.25	5.00 6.75	5.50 7.00
1921.....	5.50 6.75	4.50 6.25	5.00 6.75	6.00 7.65	7.00 7.85	7.00 7.30	6.25 7.50	5.90 6.75	5.50 6.00	5.75 6.75	6.00 7.50	7.00 7.25
1922.....	7.00 8.00	7.25 7.75	7.00 7.75	7.00 7.25	7.00 7.00	6.00 6.25	5.00 6.25	6.00 6.25	6.00 7.00	6.50 7.50	7.00 7.50	7.00 7.75
1923.....	7.25 7.50	7.25 7.50	7.25 7.50	7.25 7.25	7.00 7.75	7.75 7.75	..... .....	..... .....	7.60 8.00	8.00 9.50	8.00 9.00	8.00 9.00
1924.....	8.50 10.25	8.75 10.25	8.50 10.00	8.75 9.00	8.25 8.75	8.75 8.75	8.75 8.75	6.00 7.50	4.75 6.65	4.75 6.00	4.85 6.35	5.50 6.65
1925.....	5.75 6.40	5.25 6.15	5.25 5.90	5.25 6.30	5.50 6.40	6.35 7.70	6.85 7.35	6.75 7.75	6.50 7.75	6.75 7.75	6.50 7.75	6.50 8.00
1926.....	6.50 8.10	6.40 7.65	6.05 7.20	6.00 7.00	6.00 7.00	6.00 7.00	6.00 7.50	5.00 7.50	5.00 6.10	5.00 5.75	4.75 5.15	5.00 5.25
1927.....	4.85 5.75	4.50 5.25	4.50 4.75	4.25 4.75	4.00 4.25	4.00 5.50	4.00 5.50	3.50 4.75	2.25 3.75	2.25 3.25	3.25 4.50	3.25 4.50
1928.....	3.25 4.25	3.00 4.25	3.00 3.75	3.00 4.25	3.30 4.25	3.30 4.45	3.35 4.45	3.35 4.50	3.50 5.60	4.75 6.00	........	........

Kentucky Blue Grass Seed

Grown in the

Heart of the Blue Grass Section

Purchasers are assured of choice lots of carefully selected seed, thoroughly cleaned and graded.

Your inquiries are solicited.

SPEARS-KISER COMPANY

PARIS, KENTUCKY

HALEY-NEELEY COMPANY

Buy and Sell High Grades of

Field and Grass Seed

Sioux City, Iowa
Sioux Falls, South Dak.



Branches at
NORFOLK, NEBR.
CARROLL, IOWA
MITCHELL, So. DAK.
HURON, So. DAK.
ABERDEEN, So. DAK.

Associated:
TODD & KRAFT CO.,
Des Moines, Iowa



Kansas Grown Seed

ALFALFA, SWEET CLOVER, SUDAN and CANE

Alfalfa Seed Verified as to Origin by U. S. Dept. of Agric.

The Sedgwick Alfalfa Mills

Sedgwick, Kansas

FORAGE PLANT SEEDS PERMITTED ENTRY UNDER FEDERAL SEED ACT

By Fiscal Years Ending June 30, 1923-1928, and by Countries Exporting

(Reported by the U. S. Seed Laboratory, Washington, D. C.)

ALFALFA

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Argentina	7,751,600	7,133,200	1,037,900	221,700	(1)73,700	
Canada	3,600	960,600	1,689,600	4,218,800	5,058,400	728,300
Chile						
Czecho-Slovakia						
England	*573,600	21,400				
France		2,905,700	886,200		(2)1,600	
Germany	116,500	217,300	50,200			
Italy		113,200	499,400			
South Africa		1,328,000	508,500			
Siberia						
Turkey	173,700					
Uruguay	164,500					
Other countries	500	139,000	†110,700	107,800		54,000

ALSIKE CLOVER

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Canada	5,540,900	11,056,000	10,304,500	10,885,500	4,138,800	7,608,600
Czecho-Slovakia						
England				12,200		
Germany	2,600		48,800	42,300		
Other countries	22,600		72,000	49,400	24,400	

RAPE SEED

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
China	425,000					30,100
England	3,000	1,900	2,500	43,400	9,200	3,700
France	200,900	889,000	234,700	636,000	3,200	
Germany	22,000	65,900	99,500	735,300	149,400	83,700
Holland	1,100,300	4,918,500	2,587,300	3,043,000	3,582,700	4,616,700
Japan	4,610,400	127,000	1,381,000	1,406,500	2,998,100	1,703,300
Other countries	22,500	597,900	††39,600	†††662,100	44,900	300

HAIRY VETCH

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Canada	7,900	700		70,700	48,400	6,100
Czecho-Slovakia	101,400	600,500	465,600	568,600	32,900	42,900
Denmark	96,900	47,600	71,900	65,000	21,800	52,300
England			32,200	35,200		
Germany	1,048,100	2,221,200	1,036,900	1,982,200	927,900	1,351,200
Holland	30,800	21,200		7,000	1,200	
Latvia	172,400	11,400	205,600	959,600	787,900	1,256,900
Poland						86,000
Sweden	14,500	18,800		76,300	107,600	43,900
Other countries	127,100	293,500	***256,100	†††221,600	†††196,200	1,055,900

ENGLISH RYEGRASS

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Argentina						
Denmark		2,400		2,200		20,000
England	11,200	23,900	49,300	9,100	57,800	8,800
Ireland	976,000	1,586,600	824,900	1,823,700	578,500	624,000
New Zealand	648,000		281,600	210,700	378,600	340,200
Scotland	193,600	182,600	174,100	255,900	187,900	88,800
Other countries	5,300	156,100	5,000			1,000

CRIMSON CLOVER

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Czecho-Slovakia	50,000	416,700				21,500
Denmark						
England	437,200	43,600	4,000	82,800	187,500	19,500
France	1,614,300	5,218,300	4,339,500	4,955,900	1,438,800	725,600
Germany	62,100	989,600	82,800	76,000	11,000	107,600
Italy				21,600		
Other countries	98,600	**1,076,300	407,700	†629,200	†††747,700	†471,900

ORCHARD GRASS

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Canada	11,200	1,100				
Denmark	733,900	476,300	935,500	249,700	260,300	169,500
Germany	21,900	125,800	54,400			3,000
Holland			2,000	3,300		
Other countries	1,000	200				

*Of Turkestan origin. **376,700 lbs. from Austria and 495,500 lbs. from Hungary. †From Hungary. ††From Poland. ††† From Poland and Hungary. ***146,400 lbs. from Poland and 109,700 lbs. from Hungary. (1) American goods returned from Argentina. (2) American goods returned from France. (Table continued on opposite page)

FORAGE PLANT SEEDS PERMITTED ENTRY UNDER FEDERAL SEED ACT

(Continued from preceding page)

RED CLOVER

COUNTRY	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Argentina	.....	.....	.....	.....	.....	.....
Canada	5,100	333,100	151,900	288,000	63,100	3,300
Chile	12,200	778,700	232,600	85,200	.....	.....
Czecho-Slovakia	.....	264,700	45,300	.....	.....	††43,600
England	44,800	*3,999,000	**281,100	100	109,200	.....
France	169,800	17,610,300	4,932,600	18,889,600	10,406,500	462,300
Germany	84,000	126,200	432,600	389,900	.....	††††656,700
Holland	.....	.....	.....	11,000	.....	200,000
Italy	.....	999,400	151,100	33,000	.....	.....
Other countries	132,000	617,500	314,200	28,400	***237,300	****1,402,600
Poland	.....	.....	.....	.....	.....	1,872,300

CANADA BLUEGRASS

	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Canada	835,700	816,900	1,149,700	283,000	881,700	1,101,900

BROOM-CORN MILLET

	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Broomcorn millet not subject to the Federal Seed Act unless for seeding pur- poses from May 26, 1926.
China	3,110,600	467,500	31,100	.....	.....
England	114,100	.....	.....	.....	.....
France	.....	.....	.....	.....	.....
Germany	44,300	.....	.....	.....	.....
Italy	.....	.....	22,000	72,700	.....
Japan	1,068,900	.....	149,900	383,500	.....
Morocco	478,400	110,200	.....	.....	.....
Siberia	443,800	.....	.....	.....	.....
Other countries	100,800	17,500	50,000	200	.....

SPRING VETCH

	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Canada	.....	600	1,000	118,000	13,200	.....
Denmark	17,600	.....	.....	.....	.....	700
England	35,100	.....	.....	44,800	22,400	.....
Germany	1,115,200	460,400	208,800	479,400	308,100	187,100
Holland	233,100	616,200	945,500	405,400	109,400	63,000
Latvia	315,300	99,000	111,000	549,700	356,900	19,800
Scotland	.....	800	.....	5,500	6,600	16,800
Other countries	141,800	32,600	.....	.....	175,500	54,800
Poland	.....	.....	.....	.....	.....	220,300

ITALIAN RYEGRASS

	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Argentina	140,100	100,900	137,100	43,100	.....	.....
Denmark	.....	77,200	17,600	176,700	230,900	72,000
England	1,600	.....	.....	37,000	1,300	.....
France	.....	.....	338,400	374,600	76,100	21,800
Holland	.....	.....	37,200	2,900	500	1,900
Ireland	284,100	373,300	198,400	972,800	372,400	167,400
New Zealand	262,000	10,100	.....	2,300	34,400	187,200
Scotland	28,900	65,700	102,600	73,800	117,600	5,400
Other countries	142,800	406,700	.....	.....	.....	200

WHITE CLOVER

	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Czecho-Slovakia	35,400	75,000	197,000	88,000	15,300	24,400
Denmark	55,000	59,400	14,200	5,500	11,700	.....
England	72,600	581,800	35,400	114,300	83,900	65,400
France	11,500	34,100	.....	7,700	.....	.....
Germany	174,300	320,000	661,600	743,100	448,700	629,400
Holland	.....	.....	22,000	44,400	.....	.....
Italy	.....	.....	.....	.....	.....	.....
New Zealand	60,800	60,700	4,400	.....	6,800	15,400
Other countries	110,000	276,500	292,700	663,400	408,300	66,400
Poland	.....	.....	.....	.....	.....	977,000

ALL OTHER FORAGE CROP SEEDS

	1923 Pounds	1924 Pounds	1925 Pounds	1926 Pounds	1927 Pounds	1928 Pounds
Canada	51,400	209,400	253,400	264,200	77,000	94,600
China	65,200	.....	.....	.....	.....	.....
Denmark	3,100	100	.....	2,200	7,600	100
Germany	.....	22,000	100	15,800	.....	.....
Scotland	200	.....	.....	.....	.....	.....
Other countries	76,800	27,600	5,000	11,200	99,100	200

*585,000 lbs. of this was of Chilean origin. **All of Chilean origin except 22,000 lbs. ***211,700 lbs. of this was from European Russia. ††Of Polish origin. ††††From Poland, Hungary and Roumania. ****Of European Russian origin.

Tariff Rates Now in Effect

Approved by Senate and House Conferees, September 12, 1922

SEED AND BULB SCHEDULES

Title I. (Dutiable List)

Agricultural Seeds

Par. 722. Barley **** 20 cts. per bu. of 48 lbs.

Par. 723. Buckwheat ** 10 cts. per 100 lbs.

Par. 724. Corn or maize (including cracked corn) 15 cts. per bu. of 56 lbs. ***

Par. 726. Oats *** 15 cts. per bu. of 32 lbs.

Par. 727. Paddy or rough rice, 1 ct. per lb.

Par. 728. Rye, 15 cts., per bu. of 56 lbs.

Par. 729. Wheat, 42 cts. per bu. of 60 lbs.

Par. 760. Oil-bearing seeds and materials: Castor Beans, $\frac{1}{2}$ ct. per lb.; flaxseed, 40 cts. per bu. of 56 lbs.; poppy seed, 32 cts. per 100 lbs.; sunflower seeds, 2 cts. per lb.; **** soya beans, $\frac{1}{2}$ of 1 ct. per lb.; cotton seed, $\frac{1}{4}$ of 1 ct. per lb.

Par. 761. Grass seeds: Alfalfa, 4 cts. per lb.; alsike clover, 4 cts. per lb.; crimson clover, 1 ct. per lb.; red clover, 4 cts. per lb.; white clover, 3 cts. per lb.; clover not specially provided for, 2 cts. per lb.; millet, 1 ct. per lb.; timothy, 2 cts. per lb.; hairy vetch, 2 cts. per lb.; spring vetch, 1 ct. per lb.; all other grass seeds not specially provided for, 2 cts. per lb. Provided, that no allowance shall be made for dirt or other impurities in seed provided for in this paragraph.

Par. 1626. Oil-bearing seeds and nuts: Copra, hempseed, palm nuts, palmnut kernels, tung nuts, rapeseed, perilla and sesame seeds; seeds and nuts not specially provided for, when the oils derived therefrom are free of duty.

Memo.: In the opinion of the American Seed Trade Association counsel, Curtis Nye Smith, Esq., seedsmen should declare hempseed and all varieties of rapeseed under this Par. 1627, free of duty, and not under Pars. 761 or 762 of the Dutiable List (Title I).

COMPARISON WITH PREVIOUS RATES

Following are some of the important field and vegetable seeds showing a comparison between present import duties and those previously in force under the 1913 Tariff Act.

Alfalfa, 4, free; alsike clover, 4, free; crimson clover, 1, free; red clover, 4, free; white clover, 3, free; clover n. s. p. f., 2, free; millet,

Beet (except sugar), 4, 3; cabbage, 10, 6; canary, 1, $\frac{1}{2}$; cauliflower, 25, free; celery, 2, free; kale, 6, 6; kohlrabi, 8, 6; mangelwurzel, 4, free; mushroom spawn, 1, 1; onion, 15;

Castor beans, $\frac{1}{2}$, 3/10; * flaxseed, 40, 20; ** poppy, 32, 32; sunflower, 2, free; soya beans, $\frac{1}{2}$, free; cotton, $\frac{1}{4}$, free; rape, free, free;

*Per bushel; **per 100 pounds.

Vegetable, Flower, Other Field Seeds

Par. 762. Other garden and field seeds: Beet (except sugar beet), 4 cts. per lb.; cabbage, 10 cts. per lb.; canary, 1 ct. per lb.; carrot, 4 cts. per lb.; cauliflower, 25 cts. per lb.; celery, 2 cts. per lb.; kale, 6 cts. per lb.; kohlrabi, 8 cts. per lb.; mangelwurzel, 4 cts. per lb.; mushroom spawn, 1 ct. per lb.; onion, 15 cts. per lb.; parsley, 2 cts. per lb.; parsnip, 4 cts. per lb.; pepper, 15 cts. per lb.; radish, 4 cts. per lb.; spinach, 1 ct. per lb.; tree and shrub, 8 cts. per lb.; turnip, 4 cts. per lb.; rutabaga, 4 cts. per lb.; flower, 6 cts. per lb.; all other garden and field seeds not specially provided for, 6 cts. per lb. Provided, that the provisions for seeds in this schedule shall include such seeds whether used for planting or for other purposes.

Par. 763. Beans **** dried, $1\frac{1}{4}$ cts. per lb.

Par. 765. Lentils, $\frac{1}{2}$ of 1 ct. per lb.; lupines, $\frac{1}{2}$ of 1 ct. per lb.

Par. 767. Peas **** dried, 1 ct. per lb.

Rates on Bulbs

Par. 751. Tulip, lily and narcissus bulbs and lily of the valley pips, \$2 per thousand; hyacinth bulbs, \$4 per thousand; crocus bulbs, \$1 per thousand; all other bulbs and roots, root stocks, clumps, corms, tubers and herbaceous perennials, imported for horticultural purposes, 30 per centum ad valorem; cut flowers, fresh or preserved, 40 per centum ad valorem.

Title II. (Free List)

Par. 1657. Seeds: Chickpeas or garbanzos, cowpeas and sugar beets.

Sec. 304 (a). **** Every package containing any imported article, or articles, shall be marked, stamped, branded, or labeled in legible English words, so as to indicate clearly the country of origin.

Sec. 315. The President, under certain conditions, may until July 1, 1924, change classifications, increase or decrease duties.

In each case the first number indicates the present duty and the second the duty just prior to the passage of the 1922 Tariff Act. Figures represent duty per pound in cents.

Field Seeds

1, free; timothy, 2, free; hairy vetch, 2, free; spring vetch, 1, free; all other grass seed, 2, free; sugar beet, free, free; rape, free, free.

Vegetable Seeds

parsley, 2, 3; parsnip, 4, 3; pepper, 15, 10; radish, 4, 3; spinach, 1, 1; turnip, 4, 3; rutabaga, 4, 3; flower, 6, free; all other vegetable and field seed not specially provided for, 6, 5.

Oil-Bearing Seeds

hempseed, free, free; sesame, free; peanuts (shelled), 4, $\frac{3}{4}$; peanuts (unshelled), 3, $\frac{3}{4}$.

Wholesale Field Seeds

Buyers

**Clover
Alfalfa
Alsike
and
Timothy**

Sellers

**Henry Hirsch
& Sons**

TOLEDO

OHIO

WASHBURN WILSON SEED COMPANY

*Growers
of*

**SEED PEAS
SEED BEANS
SEED POTATOES**

Our seed stocks are grown under the best climatic conditions for the development of strong healthy plants. We maintain growing centers in irrigated as well as non-irrigated sections. All of our seed stock selections are under the personal supervision of members of our firm.

**"OUR SEEDS GROW
FRIENDS"**

Growing Contract Prices
Now Ready for 1929 Crop.

A small surplus of Seed
Peas for spot shipment.

**Washburn-Wilson
Seed Co.**

Moscow, Idaho

WHAT THE SEED VERIFICATION SERVICE MEANS

(Prepared by the Bureau of Agricultural Economics)



THE U. S. SEED Verification Service, or simply the Seed Verification Service, inaugurated in October, 1927, by the Bureau of Agricultural Economics of the U. S. Department of Agriculture, gives the buyer of alfalfa seed bearing a verified-origin seed certificate, issued under authority of the department, the proper assurance that such seed was produced where stated in the certificate.

All dealers enrolled in this Service, known as verified-origin alfalfa seed dealers, agree to obtain, so far as possible, proper assurances of origin of all lots of alfalfa purchased by them and to request verification of origin for all such lots. They also agree to keep prescribed stock records and samples, which, together with their stocks, are subject to the inspection of seed inspectors of this Bureau. Furthermore, these dealers are required to make applications for inspection certificates covering all lots which are to be verified, to submit weekly reports covering new lots of verified-origin seed prepared or offered for sale, and to comply with the rules and regulations of the Service. Forty-six dealers in 19 States, extending from New York to California and from Minnesota to Texas, have been enrolled for this season (ending June 30, 1929).

This Service is concerned only with origin of alfalfa seed; that is, locality of production, and not with variety, purity, germination, quality, grade, etc. In connection with the service no statements, expressed or implied, are to be made that the verified-origin seed certificate carries with it any verification other than that regarding the origin or locality of production and the identification of a particular lot.

The origin of every lot of seed covered by a verified-origin seed certificate may, through an examination by a Federal seed inspector of the records and samples of the verified-origin dealer offering such

seed, be traced back to the place where the seed was produced. Furthermore, these records will show what disposition is made of every pound of alfalfa seed handled by a verified-origin dealer, including non-verified as well as verified-origin lots.

Although verification this season is to be limited to alfalfa seed, the plan of the Service lends itself to verification of all kinds of seed—field, vegetable and flower. In fact, last season clovers and seed corn, as well as alfalfa were included in this Service and may be reinstated in the future if sufficient interest is manifested in the verification of origin of these seeds.

The Seed Verification Service is purely a voluntary one and there are no penalties other than the withdrawal of the privileges accorded dealers enrolled in it. Each verified-origin seed dealer understands, however, that if improper, unethical, deceptive, fraudulent, illegal, or unauthorized use is made in his advertising or otherwise of an inspection certificate or of a verified-origin seed certificate or of the service itself, he may be denied further benefits or use of this Service and that the privilege or authority to issue verified-origin seed certificates may be withdrawn.

The starting point in the evidence supporting the statement of origin is the grower's or shipper's declaration or an official state certificate of origin. The shipper in filling in a shipper's declaration declares that the lots described therein have been obtained directly from growers with proper declaration or other sufficient evidence as to locality of production, that the facts stated therein are correct to the best of his knowledge and belief, and that the locality of production and identity of each lot are properly covered in his records, which will be made accessible for verification by a Federal seed inspector at any time upon request.

With declarations at hand covering the various lots of seed for which verification is desired, the verified-origin dealer makes application to the nearest inspector for an inspection certificate, giving the kind of seed, name of shipper and shipping point, or declaration number covering the shipment, date of shipment, shipper's lot number or mark, the verified-origin dealer's receiving lot number, the quantity in pounds, place where the seed was grown, and kind of assurance of origin (declaration or verified-origin seed certificate of another verified-origin dealer) covering the shipment. This certificate is

91
Successful
Years
1838
to
1929

Prince Edward Island Bent

Extra Hardy, Field Inspected,
Certified and Sealed by the
Canadian Government.

Used extensively on Golf
Courses and Fine Lawns.

FARM AND GARDEN SEEDS RECLEANED AND PRICED RIGHT

Specialists in cars and mixed cars.
UNHULLED AND FANCY REDTOP,
KENTUCKY BLUEGRASS
and all other grasses.



Wholesale Distributors of Prince Edward Island Bent in the United States

The J. M. McCullough's Sons Co.

316 Walnut Street

CINCINNATI, OHIO

P. O. Box 845

ASK FOR
SAMPLES AND PRICES

CABLE ADDRESS
"SPEARSONS"-PARIS, KY.

OUR SPECIALTY

KENTUCKY

Blue Grass

SELECTIONS OF
CHOICE CROPS ENABLE US
TO OFFER SEED OF
THE HIGHEST QUALITY

WOODFORD SPEARS & SONS
PARIS, KENTUCKY



in effect a transcript of the dealer's own record which may be examined at any time by a seed inspector. It entitles the verified-origin dealer to issue verified-origin seed certificates for all lots covered by it.

The verified-origin seed certificate is the recognized commercial document verifying the origin and identity of the seed which it covers. This certificate may be used in either of two forms; namely, as a tag certificate attached to a bag or other container, or as an invoice certificate mailed with shipping documents. The tag certificate gives, in addition to the name and address of the verified-origin seed dealer, the kind of seed, lot number, and where the seed was grown. It is attached securely to every bag in shipments made to purchasers who are not verified-origin seed dealers. The invoice form of verified-origin seed certificates will be used mainly in transactions between verified-origin dealers.

An emblem in the form of a shield with the words "Verified-Origin Seed" superimposed upon the letters "U S" and used in connection with the word "alfalfa" has been adopted for use by verified-origin dealers in letterheads, tags, circulars, catalogs, newspaper advertising, etc. This emblem will serve to identify these dealers from others who are not enrolled in the Seed Verification Service.

This service is conducted by virtue of the authority vested in the Secretary of Agriculture by the appropriation act for that department, to establish an inspection service for perishable products. This act, among other things, provides for fees that are reasonable and that cover as nearly as possible the cost of the Service. Accordingly, for seed listed in an inspection certificate a fee of 2 cents per 100 pounds is charged. The fee for a particular lot is payable by each of the verified-origin dealers handling it.

Applications for enrollment in the Service for each year ending June 30,

will be considered between July 1-September 1 of the preceding year. Hence, application for 1929 (i. e., season of 1929-30) will be considered July 1-September 1, 1929. Because of the difficulty in supervising a service in which would be enrolled many country shippers or dealers at more or less inaccessible points who handle small quantities of alfalfa seed for which the expense of supervision would frequently be as great as, if not greater than, that incurred in inspecting records of large handlers of this seed, enrollment in this service has been considered primarily for dealers doing an interstate business and handling large quantities of alfalfa seed grown in various states. Firms in producing districts who confine their purchases of this seed largely to that produced in their respective districts and firms in consuming districts who do almost entirely a local business, probably would not find it particularly advantageous to enroll in the Seed Verification Service. Many of these firms, however, will derive benefit indirectly from the service by selling to or buying from verified-origin seed dealers.

The Seed Verification Service is in part a voluntary agreement entered into between the department and qualified dealers who agree to comply with its provisions, rules and regulations in return for the privilege of issuing verified-origin seed certificates and of enjoying the benefits to be derived therefrom. The success of the service is dependent to a considerable extent upon the whole-hearted cooperation of these dealers. The department shares with them the responsibility for making a verified-origin seed certificate in effect a guarantee that the origin of the seed is as stated. The service is being supervised closely so that every one can feel confident that its provisions are being complied with fully. Inspectors for this Service are located at Washington, D. C.; Chicago, Minneapolis, Kansas City, Salt Lake City, and San Francisco.

READ SEED WORLD

News and Advertising

for all the latest developments in the Seed Trade Field

Sweet Clover Domestic Red Clover Alfalfa

*And All Farm And
Garden Seeds*

Northrup, King & Co.
Minneapolis, Minn. Estb. 1884

RUDY-PATRICK SEED CO.

WE SPECIALIZE IN
ALFALFA
SWEET CLOVER
BLUE GRASS
MEADOW FESCUE
ORCHARD GRASS
SUDAN
MILLET
AND CANE

Kansas City, Missouri

Morris Grain and Seed Co.

*Genuine Grundy
County*

SWEET CLOVER

and full line of
FIELD SEEDS
CAR LOTS OR LESS



Morris, Illinois

LOCATION OF SEED LABORATORIES

Many seedsmen use state and Government seed laboratories for the testing of their various lots of seeds, both for purity and germination. The following table lists the various state and Government seed laboratories in United States and Canada.

STATE	CITY	LOCATION
ALABAMA	Montgomery	Department of Agriculture
ARIZONA	Tucson	Agricultural Experiment Station
ARKANSAS	Fayetteville	Agricultural Experiment Station
CALIFORNIA	Sacramento	State Department of Agriculture
COLORADO	Fort Collins.....	Agricultural Experiment Station
CONNECTICUT ...	New Haven.....	Agricultural Experiment Station
DELAWARE	Dover	State Board of Agriculture
IDAHO	Boise	State Capital
INDIANA	Lafayette	Agricultural Experiment Station
ILLINOIS	Springfield	Department of Agriculture
IOWA	Ames	Agricultural Experiment Station
KANSAS	Manhattan	Agricultural Experiment Station
KENTUCKY	Lexington	Agricultural Experiment Station
LOUISIANA	Baton Rouge.....	State Board of Agriculture
MAINE	Orono	Agricultural Experiment Station
MARYLAND	College Park.....	Agricultural Experiment Station
MASSACHUSETTS.	Amherst	Agricultural Experiment Station
MICHIGAN	Lansing	State Department of Agriculture
MINNESOTA	St. Paul.....	University Farm, Agri. Exp. Station
MISSISSIPPI	A. & M. College....	Agricultural Experiment Station
MISSOURI	Columbia	Agricultural Experiment Station
MONTANA	Bozeman	Agricultural Experiment Station
NEBRASKA	Lincoln	Department of Agriculture
NEW JERSEY	New Brunswick....	Agricultural Experiment Station
NEW HAMPSHIRE.	Durham	Agricultural Experiment Station
NEW MEXICO	State College.....	Agricultural Experiment Station
NEW YORK.....	Geneva	Agricultural Experiment Station
NORTH CAROLINA	Raleigh	Department of Agriculture
NORTH DAKOTA...	Agricultural College.	Agricultural Experiment Station
OHIO	Columbus	Department of Agriculture
OKLAHOMA	Oklahoma City.....	Board of Agriculture
OREGON	Corvallis	Agricultural Experiment Station
PENNSYLVANIA .	Harrisburg	Department of Agriculture
RHODE ISLAND...	Kingston	Agricultural Experiment Station
SOUTH CAROLINA.	Columbia	Department of Agriculture
SOUTH DAKOTA...	Brookings	Agricultural Experiment Station
TENNESSEE	Nashville	State Department of Agriculture
TEXAS	Austin	State Department of Agriculture
UTAH	Salt Lake City.....	State Crops and Pests Commission
VERMONT	Burlington	Agricultural Experiment Station
VIRGINIA	Richmond	Department of Agriculture
WASHINGTON	Olympia	Department of Agriculture
WASHINGTON,D.C.*	.....	Bureau of Plant Industry, U. S. Department of Agriculture
WEST VIRGINIA...	Charleston	Exp. Station, Dept. of Agriculture
WISCONSIN	Madison	Department of Agriculture
WYOMING	Laramie	Agricultural Experiment Station
CANADA	Calgary	Seed Branch, Dept. of Agriculture
CANADA	Quebec	Seed Branch, Dept. of Agriculture
CANADA	Ottawa	Seed Branch, Dept. of Agriculture
CANADA	Winnipeg	Seed Branch, Dept. of Agriculture
CANADA	Toronto	Seed Branch, Dept. of Agriculture

*States not having laws regulating the sale of seeds. All other states have laws regulating the sale of seeds. Copies of the laws may be obtained by communicating with the various departments as indicated above.

DOMINION of CANADA

ALSIKE

ALFALFA

Canadian Variegated
Genuine Grimm

SWEET CLOVER

White Blossom
Yellow Blossom

CANADIAN BLUE GRASS

Please write or wire for samples
and quotations.



**NORTHERN
GROWN
SAMPLES
AND
PRICES
CARLOTS**

STEELE, BRIGGS SEED CO.

Limited
"CANADA'S GREATEST SEED
HOUSE"

TORONTO CANADA
Established Over 50 Years



We Specialize in
**CLOVER, GRASS, FIELD, FOREST
and FRUIT-TREE—SEEDS**
**NATURAL and COLORED RAFFIA
PEAT MOSS**

JULIUS LOEWITH, INC.

NEW YORK, U. S. A.

Cable Address: Myosotis

New York

GRIMM ALFALFA SEED

Idaho Grown

Sealed Bags

State Inspection



Certified and

Sealed by State

Seed Commr. Idaho

Produced and Marketed by

IDAHO GRIMM ALFALFA SEED GROWERS ASSOCIATION
BLACKFOOT, IDAHO

ADDRESSES OF STATE AGRICULTURAL COLLEGES AND EXPERIMENT STATIONS

ALABAMA—Auburn, Ala.	NEBRASKA—Lincoln, Nebr.
ARIZONA—Tucson, Ariz.	NEVADA—Reno, Nev.
ARKANSAS—Fayetteville, Ark.	NEW HAMPSHIRE—Durham, N. H.
CALIFORNIA—Berkeley, Calif.	NEW JERSEY—New Brunswick, N. J.
COLORADO—Fort Collins, Colo.	NEW MEXICO—State College, N. M.
CONNECTICUT—New Haven, Conn.	NEW YORK—Ithaca, N. Y.
DELAWARE—Newark, Dela.	NORTH CAROLINA—State College Station, Raleigh, N. C.
FLORIDA—Gainesville, Fla.	NORTH DAKOTA—Fargo, N. D.
GEORGIA—Athens, Ga.	OHIO—Wooster, Ohio.
IDAHO—Moscow, Ida.	OKLAHOMA—Stillwater, Okla.
ILLINOIS—Urbana, Ill.	OREGON—Corvallis, Ore.
INDIANA—Lafayette, Ind.	PENNSYLVANIA—State College, Pa.
IOWA—Ames, Ia.	RHODE ISLAND—Kingston, R. I.
KANSAS—Manhattan, Kans.	SOUTH CAROLINA—Clemson College, S. C.
KENTUCKY, Lexington, Ky.	SOUTH DAKOTA—Brookings, S. D.
LOUISIANA—Baton Rouge, La.	TENNESSEE—Knoxville, Tenn.
MAINE—Orono, Me.	TEXAS—College Station, Tex.
MARYLAND—College Park, Md.	UTAH—Logan, Utah.
MASSACHUSETTS, Amherst, Mass.	VERMONT—Burlington, Vt.
MICHIGAN, East Lansing, Mich.	VIRGINIA—Blacksburg, Va.
MINNESOTA—University Farm, St. Paul, Minn.	WASHINGTON—Pullman, Wash.
MISSISSIPPI—A. and M. College, Miss.	WEST VIRGINIA—Morgantown, W. Va.
MISSOURI—Columbia, Mo.	WISCONSIN, Madison, Wis.
MONTANA—Bozeman, Mont.	WYOMING—Laramie, Wyo.

FIELD SEED PRODUCTION IN UNITED STATES FOR PAST FIVE YEARS

(Subject to Revision)

(Compiled by Hay, Feed & Seed Division, Bureau of Agricultural Economics,
U. S. Department of Agriculture)

Kind	Lbs. or Bu.	1923	1924	1925	1927	1928**
Alfalfa	Lbs.	54,500,000	60,000,000	57,000,000	47,500,000	28,000,000
Clover, alsike	Lbs.	16,800,000	16,500,000	17,000,000	22,500,000	13,500,000
Clover, red	Lbs.	38,000,000	44,000,000	40,000,000	75,000,000	56,000,000
Clover, white	Lbs.	800,000	1,300,000	1,500,000	1,700,000	1,200,000
Clover, crimson	Lbs.	300,000	300,000	175,000	300,000	350,000
Bluegrass, Ky.	Bus.	775,000	535,000	2,000,000	1,800,000	325,000
Meadow Fescue*	Lbs.	2,100,000	1,750,000	1,300,000	2,500,000	1,300,000
Orchard Grass	Bus.	160,000	130,000	400,000	195,000	225,000
Redtop*	Lbs.	10,500,000	6,000,000	8,300,000	18,000,000	14,250,000
Sudan Grass	Lbs.	24,000,000	28,000,000	25,000,000	37,000,000	33,000,000
Timothy	Lbs.	90,000,000	80,000,000	87,000,000	96,000,000	55,000,000

*Recleaned seed.

**Preliminary figures subject to revision.

BURPEE'S SEEDS GROW

The quality of Burpee's Seeds is backed by the famous Fordhook Trial Grounds and by our extensive operations as seed growers.

Burpee's Fordhook Farms

in Pennsylvania, Burpee's Sunnybrook Farm in New Jersey, and Burpee's Floradale Farms in California, are known for the excellent stocks of seed they produce.

If you need Quality Seeds write to

W. ATLEE BURPEE CO.

SEED GROWERS

PHILADELPHIA

Established 78 Years

Everything In Seeds, Bulbs, Etc.

SPECIALTIES FOR EXPORT

Feeding Beets, Mangels, Swede Turnips

CANADIAN GROWN

Alsike Clover

Beans—Field and Garden

Peas—Field and Garden

Sweet Clover, White Blossom

Onion Sets, Shallot and Potato

Alfalfa Clover

Blue Grass

Hairy Vetch

Red Clover

Onions

Correspondence Solicited

Members American & Canadian Seed Trade Associations

" Farm Seed Association of North America

John A. Bruce & Co., Limited

HAMILTON, CANADA

WEIGHT AND MEASURE EQUIVALENTS

- 1 Milligram (mg.) = 0.1 centigram = 0.015,432 grain = 0.001 gram.
- 1 Centigram (cg.) = 10 milligrams = 0.154,324 grain = 0.01 gram.
- 1 Decigram (dg.) = 1.543,24 grains = 0.1 gram.
- 1 Gram (g.) = 1,000 milligrams = 100 centigrams = 15.432,356 grains = 0.035,274 ounce (Avd.) = 0.032,150 ounce (Troy) = 0.002,204 pound (Avd.) = 0.001 kilogram.
- 1 Kilogram or Kilo (kg.) = 15,432.356,39 grains = 1,000 grams = 35.2740 ounces (Avd.) = 32.150,7 ounces (Troy) = 2.204,62 pounds (Avd.).
- 1 Grain (gr.) (same in Avoirdupois, Troy or Apothecary weights) = 64.798 milligrams = 6.479 centigrams = 0.064,798 gram = 0.002,285 ounce (Avd.).
- 1 Ounce (oz.) (Avd.) = 2,834.95 centigrams = 437.500 grains = 28.349,5 grams = 16 drams (Avd.) = 0.911,458 ounce (Troy) = 0.062,500 pounds (Avd.) = 0.028,349 kilogram.
- 1 Pound (lb.) (Avd.) = 7,000 grains = 453.592,427 grams = 256 drams (Avd.) = 16 ounces (Avd.) = 14.583,3 ounces (Troy) = 0.453,592 kilogram.
- 1 carat (diamond) = 200 milligrams. 1 carat (diamond) = 4 pearl grains.
- 1 pennyweight (dwt.) (Troy) = 24 grains = 1.555,17 grams = $\frac{1}{20}$ ounce (Troy or Apoth.). 1 gram = 0.643,015 pennyweight.
- 1 scruple (Apoth.) = 20 grains = 1.295,978 grams = $\frac{1}{8}$ dram (Apoth.) = $\frac{1}{24}$ ounce (Troy or Apoth.). 1 gram = 0.771,618 scruple.
- 1 dram (Avd.) = $27\frac{1}{2}$ or 27.343,75 grains = 1.771,85 grams = 0.455,729 drams (Apoth.) = $\frac{1}{16}$ ounce (Avd.). 1 gram = 0.564,383 dram (Avd.).
- 1 dram (Apoth.) = 60 grains = 3.887,934 grams = 3 scruples = 2.194,29 drams (Avd.) = $\frac{1}{8}$ ounce (Apoth.). 1 gram = 0.257,206 dram (Apoth.).
- 1 ounce (oz.) (Troy) = 480 grains = 31.103,5 grams = 20 pennyweights = 1.097,14 ounces (Avd.) = 1 ounce (Apoth.) = $\frac{1}{2}$ or 0.083,333 pound (Troy or Apoth.) = 0.068,571 pound (Avd.). 1 gram = 0.032,150 ounce (Troy). 1 ounce (Avd.) = 0.911,458 ounce (Troy). 1 pound (Avd.) = 14.583,3 ounces (Troy). 1 kilogram = 32.150,7 ounces (Troy).
- 1 ounce (Apoth.) = 480 grains = 31.103,5 grams = 24 scruples = 8 drams (Apoth.) = 1.097,14 ounces (Avd.) = 1 ounce (Troy) = $\frac{1}{2}$ or 0.083,333 pound (Apoth. or Troy) = 0.068,571 pound (Avd.).
- 1 gram = 0.032,150,7 ounce (Apoth.). 1 ounce (Avd.) = 0.911,458 ounce (Apoth.). 1 pound (Avd.) = 14.583,3 ounces (Apoth.). 1 kilogram = 32.150,7 ounces (Apoth.).
- 1 meter = 39.370,00 inches 1 inch = 25.400,05 millimeters 1 foot = 304.801 millimeters
 1 meter = 3.280,83 feet 1 inch = 2.540,005 centimeters 1 foot = 30.480,1 centimeters
 1 meter = 1.093,61 yards 1 inch = .025,400,05 meters 1 foot = .304,801 meter

Attach a sticker (page 179) when writing advertisers.
 It helps us give you better service.

Consider
the Seed In-
dustry. What
do Seedsmen
sell besides
seeds?



Fertilizers, Garden Tools, Sprayers,
Spraying Compounds, Nursery
Stock, Dog Supplies, Gold Fish Sup-
plies, Poultry Supplies, Insecticides,
and many other lines used by the
gardener and farmer.

More than 41,000,000 customers for
these items are in direct sales con-
tact with the readers of

SEED WORLD

Your ad in Seed World gives you a
"complete coverage" of this enor-
mous purchasing power.

WRITE FOR FULL INFORMATION

SEED WORLD
1018 SO. WABASH AVENUE
CHICAGO, ILL.

CHARACTERISTICS OF FIELD SEEDS

VARIETY	Viability of Good Seed	Purity of Good Seed	Average Germination One Year Old	Average Length of Vitality Years	Weight of Seed Per Bu. Legal	Weight of Seed Per Bu. Actual	Quantity Required Per Acre	Yield of Seed Per Acre	Number of Seeds Per Pound Average
Alfalfa	97-99	98-99	94	6-8	60	60-63	15-20	300-700	220,000
Bluegrass, Kentucky.....	70-85	75-85	30-40	1-2	14	14-28	20-30	200-350	2,400,000
Bluegrass, Canada.....	85	75-85	30-40	1-2	14	14-24	15	200-500	2,400,000
Brome Grass.....	90-95	98-99	85-90	5	14	12-20	10-14	250-350	137,000
Clover, Alsike.....	99	99	75	2	60	60-66	8-12	100-300	700,000
Clover, Red.....	99	99	90	5-6	60	60-63	8-12	100-300	250,000
Clover, White.....	99	98	75	2	60	60-63	8-12	200-300	700,000
Clover, Crimson.....	99	99	90	2	60	60-63	12-20	200-300	125,000
Clover, Sweet.....	95-98	99	90-95	5	.....	.....	20-30	150-400	235,000
Cowpea	90	99	80	2	60	Variable	30-60	900-1800	1,800-5,100
Fescue, Meadow.....	95	90	93	2	.....	20-30	10-15	200-300	250,000
Millet, Foxtail (Common, Golden, Hungarian, Siberian).....	90	98	88	4	48-50	40-55	25-50	.....	200,000
Orchard Grass.....	98	97	90	2-3	14	12-22	12-20	140-168	400,000
Rape	95	99	90	6	.....	.....	2-4	600-1000	.....
Redtop	95	95-98	.....	6	14	12-40	10-20	.....	4,135,900
Rye Grass, Perennial.....	95	98	80	2	.....	10-30	25-35	250-500	336,000
Rye Grass, Italian.....	95	98	80	2	20	12-24	35-40	500	285,000
Soy Bean.....	98	99	90	2	60	60	20-30	1000-2400	2144-6388
Timothy	98	98	95	5-6	45	42-50	9-15	225-450	1,170,500
Vetch	95	99	90	3	60	60	40-90	600-720	8,500-16,000

RUSSIAN AND UKRAINIAN SUGAR BEET SEEDS

(Kleinwanzleben Type)

Exceptionally high sugar yields per acre.
Absolutely guaranteed as to purity,
germination and freedom from all foreign seeds. All seeds grown and packed
under supervision of

"SAKHAROTREST"

(Soviet Sugar Trust)

Seeds now on hand in New York City.
Samples furnished for field trials and
experimental purposes. Correspondence
for NEW CONTRACTS SOLICITED.
Send for bulletins.

We also represent several other seed
breeding organizations in Soviet Union,
and are ready to submit samples and
prices on the following seeds:

Ukrainian Red Clover
Turkestan Alfalfa
Vetches
Russian Red Clover
Selected Seed Grains
Vegetable and Fruit Tree Seeds

AMTORG TRADING CORPORATION

165 Broadway

New York City

COMMODITIES FOR WHICH BUSHEL WEIGHTS HAVE BEEN ESTABLISHED IN MORE THAN FOUR STATES

Kind	Commonly Accepted Weight per Bu.—Lbs.	
Alfalfa	60	
Barley	48	50 lbs. in California. 32 lbs. in Louisiana.
Beans	60	
Beans, Castor	46	50 lbs. in Iowa, Maryland, Nebraska and South Dakota. 48 lbs. in Florida.
Beans, Lima	56	
Beans, Soy	58	60 lbs. in North Carolina and Virginia.
Bluegrass	14	
Bran	20	
Brome grass	14	
Broomcorn	50	42 lbs. in Alabama, South Carolina and Tennessee. 48 lbs. in Arkansas, Illinois, Oklahoma and Texas. 30 lbs. in Kansas and North Dakota. 57 lbs. in Minnesota and West Virginia. 44 lbs. in North Carolina. 45 lbs. in Ohio.
Buckwheat	48	50 lbs. in Alabama, Idaho, Minnesota, Nebraska, Nevada, North Carolina, Ohio, South Carolina, Tennessee and Wisconsin. 52 lbs. in Arkansas, Georgia, Illinois, Missouri, Montana, New Mexico, Oklahoma and Texas. 40 lbs. in California. 56 lbs. in Kentucky. 42 lbs. in North Dakota.
Canary Seed	60	
Clover Seed	60	
Corn, Cracked ...	50	
Corn, in Ear.....	70	68 lbs. in Ohio and West Virginia.
Corn, Pop, in Ear.	70	42 lbs. in Ohio.
Corn, Shelled	56	52 lbs. in California.
Corn, Sweet	50	48 lbs. in Minnesota and North Dakota. 45 lbs. in Ohio.
Cornmeal	50	48 lbs. in Arkansas, Florida, Idaho, Illinois, Iowa, Maryland, Mississippi, Nebraska, Nevada, Ohio, Virginia and West Virginia.
Cottonseed	32	30 lbs. in Georgia, North Carolina, South Carolina and Virginia. 33½ lbs. in Arkansas. 33 lbs. in Missouri. 28 lbs. in Tennessee.
Emmer	40	48 lbs. in Nebraska. 45 lbs. in Wyoming.
Flaxseed	56	
Hempseed	44	50 lbs. in Minnesota and North Dakota. 48 lbs. in Nevada.
Herdsgrass	45	
Kafir Corn	56	50 lbs. in North Carolina and Texas.
Kale	12	10 lbs. in North Carolina. 15 lbs. in South Carolina. 30 lbs. in Tennessee.
Millet	50	48 lbs. in Minnesota.
Millet, Jap.	35	
Oats	32	
Orchard Grass ...	14	
Peanuts	22	25 lbs. in Georgia. 20 lbs. in Illinois, Maine, New Hampshire, South Dakota and Vermont. 24 lbs. in Kentucky and Mississippi. 23 lbs. in South Carolina and West Virginia.
Peas	60	
Potatoes, Irish ..	60	56 lbs. in West Virginia.
Potatoes, Sweet ..	50	55 lbs. in Alabama, Georgia, Kentucky, Minnesota and Oklahoma. 54 lbs. in Connecticut, Maine, Mississippi, New Hampshire, New York, Pennsylvania, Rhode Island, South Dakota, Vermont and Wisconsin. 56 lbs. in Florida, Michigan, Missouri, North Carolina and Virginia.
Rape Seed	50	
Red Top	14	
Rice (unhulled)...	45	44 lbs. in Maine, North Carolina and South Carolina. 43 lbs. in Georgia.
Rye	56	54 lbs. in California.
Sorghum	50	57 lbs. in Minnesota, North Dakota and West Virginia. 56 lbs. in Florida. 42 lbs. in Mississippi and Missouri.
Speltz	40	48 lbs. in Nebraska. 45 lbs. in Wyoming.
Timothy	45	60 lbs. in Arkansas.
Wheat	60	

MORROW SEED CO.

C. S. Morrow LIMITED Wm. Rankin
Pres. Man. Director

39 FRONT ST. E.
TORONTO, CAN.

Growers of

SEED PEAS AND BEANS

Exclusively

We solicit your orders
for 1928 Canadian
Grown stocks, also con-
tracts for 1929 Growing.

Mills and Elevators at
Pt. Hope, Lindsay, Totten-
ham, Dashwood and
Toronto

Webb's

Pedigree English Seeds

Our selected Strains of
MANGOLDS, SWEDES,
TURNIPS, GIGANTIC
RAPE, KALE
are famous the World over.

Prices Mailed on Request.
Over 2000 Acres of Seed Farms.

Edward Webb & Sons, Ltd.,
Wordsley, Stourbridge,
England

WM. A. WARD SEED COMPANY

SACRAMENTO, CALIFORNIA

Growers of

SELECTED STRAINS OF ALL CALIFORNIA VEGETABLE SEEDS

BEANS, PEAS, BEET, CARROT, ONION, PARSNIP,
SALSIFY, CHARD AND NEW YORK LETTUCE

We are also Wholesale Grass Seed Dealers, specializing in California
Alfalfa, Bur Clover, Melilotus Indica and Sudan Grass.

VAN ANTWERP'S SOUTHERN SEED SPECIALISTS

Introducers—Of the World's Newest Turnip "VADCO-
JAPPO" for Summer Planting and Canning Factory Use

Write for Full Information and Ask for a Copy of Our Wholesale
Seed Price List.

VAN ANTWERP'S SEED STORE
MOBILE ALABAMA

DIRECTORY SECTION

(See Index on pages 5 and 6.)

On the following pages are given the names and addresses of seed growers, wholesalers of both field and garden seeds. For manufacturers of store and warehouse supplies, and merchandise for resale purposes, etc., see pages 128 and 164.

By this method of classification it is easy to locate the growers or wholesalers in any particular state or section of the country and the manufacturer or distributor of anything used by the seed dealer in the conduct of his own business or sold to his patrons.

Every effort has been made, in compiling this directory, to make it as complete as possible. The names and the lines handled were supplied by the firms listed in response to a general invitation to the trade.

The publication of this book has been made possible by the support and co-operation of the firms listed in black face type and whose advertising appears on the pages as indicated by the numbers following their names.

WHOLESALE FIELD SEEDS

ALABAMA

Buchanan Feed & Seed Co.,
Anniston, Ala.

Poyner Seed Co.

Dothan, Ala.

Florence Seed & Feed Co.

Florence, Ala.

North Alabama Seed Co.

Florence, Ala.

Wind & Co., Inc.

Huntsville, Ala.

Van Antwerp Seed Store

Mobile, Ala.

(See Adv. Index Page 178)

Hawthorne-Jones Co., Inc.

Montgomery, Ala.

Callen, Geo. M.

Selma, Ala.

ARIZONA

Capital Fuel & Feed Co.

Phoenix, Ariz.

Liefgreen Seed Co.

Phoenix, Ariz.

Quick Seed & Feed Co.

Phoenix, Ariz.

Alfalfa Seed Co.

Yuma, Ariz.

Pawley, A.

Yuma, Ariz.

Sanguinetti, E. F.

Yuma, Ariz.

Turner, Leo

Yuma, Ariz.

ARKANSAS

Fort Smith Seed Co., Inc.

Fort Smith, Ark.

Lee, Arthur G.

Fort Smith, Ark.

CALIFORNIA

Aggeler & Musser Seed Co.

Los Angeles, Cal.

(See Adv. Index Page 178)

Germain Seed & Plant Co.

Los Angeles, Cal.

(See Adv. Index Page 178)

Bomberger Seed Co.

Modesto, Cal.

Ward Seed Co., Wm. A.
Sacramento, Cal.

(See Adv. Index Page 178)

Sevin-Vincent Seed Co.

San Francisco, Cal.

Volkmann & Co., C. M.

San Francisco, Cal.

CANADA

McKenzie Co., Ltd., A. E.

Brandon, Man., Canada

Hunter & Co., A. S.

Durham, Ont., Canada

Bruce & Co., Ltd., John A.

Hamilton, Ont., Canada

(See Adv. Index Page 178)

McDonald & Sons, Ltd., Kenneth

Ottawa, Ont., Canada

Canada Seed Co., Ltd., The

Toronto, Ont., Canada

Goodall, Ltd., James

Toronto, Canada

Hogg & Lytle, Ltd.

Toronto, Ont., Canada

Keith & Sons, Geo.

Toronto, Canada

Morrow Seed Co., Ltd.

Toronto, Ont., Canada

(See Adv. Index Page 178)

Rennie Co., Wm., Ltd.

Toronto, Canada

Steele, Briggs Seed Co., Ltd.

Toronto, Canada

(See Adv. Index Page 178)

Webb & Sons, Ltd., Edward

Toronto, Canada

(See Adv. Index Page 178)

COLORADO

Barteldes Seed Co.

Denver, Colo.

Western Seed Co.

Denver, Colo.

Grand Junction Seed Co.

Grand Junction, Colo.

(See Adv. Index Page 178)

Strain Bros.

Lamar, Colo.

James, R. H.

Rocky Ford, Colo.

Want Information?

Write the SEED WORLD Free Service Bureau.

It was established for this very purpose.

SEED WORLD, 1018 So. Wabash Ave., Chicago

WHOLESALE FIELD SEEDS—Continued

CONNECTICUT

Cadwell & Jones
Hartford, Conn.
Chamberlain & Son
Hartford, Conn.
Platt Co., Inc., The Frank S.
New Haven, Conn.
Comstock, Ferre & Co.
Wethersfield, Conn.
(See Adv. Index Page 178)

DIST. OF COLUMBIA

Bolgiano & Co., F. W.
Washington, D. C.

GEORGIA

Planters Seed Co.
Americus, Ga.
Cofer & Co., H. L.
Athens, Ga.
The Rowland Co.
Athens, Ga.
Snelson Seed Co.
Athens, Ga.
Everett Seed Co.
Atlanta, Ga.
Heard, Geo. (Cowpeas)
Atlanta, Ga.
Walton & Co.
Augusta, Ga.
Rhodes Seed Co. (Cowpeas)
Forsythe, Ga.
Settle & Robison (Cowpeas)
Jackson, Ga.
Arrington, H. H.—Pearl Millet
Rome, Ga.
Curry-Arrington Co.
Rome, Ga.

IDAHO

Idaho Grimm Alfalfa Seed Growers Assn.

Blackfoot, Idaho

(See Adv. Index Page 178)

Central Coal & Seed Co. —
Boise, Idaho
Union Seed & Fuel Co.
Boise, Idaho
Buhl Seed & Grain Co. —
Buhl, Idaho
Pioneer Seed & Grain Co.
Burley, Idaho
Caldwell Produce Co. +
Caldwell, Idaho
Lilly Seed Co. —
Caldwell, Idaho
Jerome Milling & Elevator Co.
Jerome, Idaho
Means, Mark
Lewiston, Idaho
Vollmer Clearwater Co.
Lewiston, Idaho
Washburn-Wilson Seed Co.
Moscow, Idaho
(See Adv. Index Page 178)
Darrow Bros. Seed & Supply Co. —
Twin Falls, Idaho
Wendel Milling & Elev. Co.
Wendel, Idaho

ILLINOIS

Funk Bros. Seed Co.
Bloomington, Ill.
Vollbracht Co., Wm.
Camp Point, Ill.

American Field Seed Company

Chicago, Ill.
Dickinson Co., Albert
Chicago, Ill.
Hales & Hunter Co.
Chicago, Ill.
Kellogg Seed Co., John L.
Chicago, Ill.
(See Adv. Index Page 178)
Johnson, Inc., J. Oliver
Chicago, Ill.
Maulding & Co., C. A.—(Redtop)
Dahlgren, Ill.
Schultz, J. M.
Dieterich, Ill.
Keith & Son, L. J.—(Redtop)
Fairfield, Ill.
Poorman & Co., A. J.
Fairfield, Ill.
Egyptian Seed Growers Exchange—
(Redtop)
Flora, Ill.
Noble Bros.
Gibson City, Ill.
Morris Grain & Seed Co.
Morris, Ill.
(See Adv. Index Page 178)
Olney Seed & Feed Store
Olney, Ill.
Shultz Seed Co.
Olney, Ill.
Kelly Seed Co.
Peoria, Ill.
Keller & Sons, Geo.
Quincy, Ill.
Quincy Seed Co.
Quincy, Ill.
Condon Bros.
Rockford, Ill.
(See Adv. Index Page 178)
Wayne City Seed Co.—(Redtop and Sun-
flower)
Wayne City, Ill.

INDIANA

Studebaker Grain & Seed Co.
Bluffton, Ind.
Crabbs, Reynolds, Taylor Co.
Crawfordsville, Ind.
Crawfordsville Seed Co.
Crawfordsville, Ind.
Seberger Seed Co.
Crown Point, Ind.
Heldt Co., The
Evansville, Ind.
McCarty Co., The J. A.
Evansville, Ind.
Ohio Valley Seed Co.
Evansville, Ind.
Purcell Seed Co.
Evansville, Ind.
Kraus & Apfelbaum
Fort Wayne, Ind.
Wolf Seed Co.
Fort Wayne, Ind.
Hooton-Davis Seed Co.
Lebanon, Ind.
Scott Seed Co.
New Albany, Ind.
Meyer Grain Co.
South Whitley, Ind.
Goodrich Bros. Co.
Winchester, Ind.

Our Advertisers Made This Book Possible
USE THE STICKER!

(Page 179)

and you will convince them that it was worth the effort.

**At last, in response to the demands
of the entire agricultural world!**

A 1,500-acre
pineapple plan-
tation in Hawaii
completely cov-
ered with Mulch
Paper. More
than 4,000 miles
were laid in
Hawaii in 1927.



GATOR-HIDE MULCH PAPER

Is Now Available in Unlimited Quantities

IN the spring of 1928, International Paper Company announced, through its advertising in a large list of farm and garden publications, the acquisition of the Eckart Patents covering the manufacture and sale of Mulch Paper in the 37 states east of Colorado.

At that time, with but limited production facilities, it was decided to restrict the sale of the paper to four rolls to the individual notwithstanding the fact that even then cer-

tain planters were waiting to cover acres of land with it.

The result of the restricted sales policy, however, was that thousands instead of a mere handful of planters were able to experiment with the paper and see for themselves just what miracles it works in stimulating plant growth.

*Now Ready for Sales in
Any Quantity*

Today, however, with production established, we are able to

GATOR-HIDE

The MIRACLE PAPER- THAT PRODUCES

offer Gator-Hide Mulch Paper in unlimited quantities, and distributorships are being established throughout the country.

Extensive Advertising in 1929

The Gator-Hide Mulch Paper Advertising Campaign for 1929 embraces a representative group of farm and garden publications and includes extensive sales promotion work through County Fairs, Motion Picture Films, etc. It is a campaign so broad in its scope that, coupled with the existing demand for Mulch Paper, it is certain to produce a profitable business for everyone engaged in handling Gator-Hide.



This paper is completely covered by the Eckart Patents under which the International Paper Company has the rights for production and sale in the 37 states east of Colorado.



Write for Dealer Proposition

If you are interested, write us at once for full particulars. The opening gun in the 1929 advertising campaign will be fired one month before 1929 dawns—in the December issues of the farm magazines.

Gator-Hide Mulch Paper should be listed in all catalogues. Write for electros or mats.

INTERNATIONAL PAPER CO.

Dept. S2, Mulch Paper Division

Pershing Square Building

Park Ave. and 42nd St., New York City

What Gator-Hide Mulch Paper Is

GATOR-HIDE MULCH PAPER is an extremely tough Kraft Paper impregnated by a special process with asphalt. Its manufacture and sale by International Paper Company are completely covered by the Eckart Patents.

The paper, in use, is laid directly over the prepared plant beds and planting is accomplished either through holes made in the paper or between successive rows of the paper.

The value of Mulch Paper lies in the fact that it increases the temperature of the soil, retards evaporation of moisture by the sun, and practically eliminates all weeding.

\$500,000 is invested in Paper Mulch annually in Hawaii for pineapple cultivation, and the resulting increase in yield has been estimated at 30%. In this country increases on crop yields have varied from 73% to more than 600%.

MULCH PAPER

BIGGER, BETTER AND EARLIER CROPS

WHOLESALE FIELD SEEDS—Continued

IOWA

- Haley-Neeley Co.
Carroll, Iowa
(See Adv. Index Page 178)
- Hamilton Seed & Coal Co.
Cedar Rapids, Iowa
(See Adv. Index Page 178)
- Council Bluffs Seed Co.—Seed Corn
Council Bluffs, Iowa
- Ouren Seed Co.
Council Bluffs, Iowa
(See Adv. Index Page 178)
- Younkerman Seed Co.
Council Bluffs, Iowa
- Davenport Seed Co.
Davenport, Ia.
(See Adv. Index Page 178)
- Standard Seed Co.
Des Moines, Iowa
- Todd & Kraft Co.
Des Moines, Iowa
- Nishna Valley Seed Co. (Seed Corn)
Shenandoah, Iowa
(See Adv. Index Page 178)
- Bruns Seed & Grain House
Sigourney, Iowa
- Haley-Neeley Co.
Sioux City, Iowa
(See Adv. Index Page 178)
- Sioux City Seed Co.
Sioux City, Iowa
(See Adv. Index Page 178)
- Wertz Seed Co.
Sioux City, Ia.
(See Adv. Index Page 178)

KANSAS

- Mangelsdorf Seed Co.
Atchison, Kan.
- Bowman Seed Co.
Concordia, Kan.
(See Adv. Index Page 178)
- Barteldes Seed Co.
Lawrence, Kan.
- Salina Produce Co.
Salina, Kan.
(See Adv. Index Page 178)
- Sedgwick Alfalfa Mills
Sedgwick, Kan.
(See Adv. Index Page 178)
- Coe Seed & Grain Co., D. O.
Topeka, Kan.
(See Adv. Index Page 178)
- Ross Bros. Seed Co.
Wichita, Kan.

KENTUCKY

- Brent Seed Co., The C. S.
Lexington, Ky.
- Lexington Seed Co.
Lexington, Ky.
- Chambers Seed Co.
Louisville, Ky.
- Hall Seed Co.
Louisville, Ky.
(See Adv. Index Page 178)
- Hardin, Hamilton & Lewman
Louisville, Ky.
- Lewis Implement & Seed Co.
Louisville, Ky.
- Louisville Seed Co.
Louisville, Ky.
- National Seed Co.
Louisville, Ky.

- Ross Seed Co.
Louisville, Ky.
- Watts & Son, John R.
Louisville, Ky.
- Wood, Stubbs & Co.
Louisville, Ky.
- Brent & Co., Inc.
Paris, Ky.
- Spears & Sons, Woodford
Paris, Ky.
(See Adv. Index Page 178)
- Spears-Kiser Co.
Paris, Ky.
(See Adv. Index Page 178)
- Wilson, Jas. S.
Paris, Ky.
(See Adv. Index Page 178)

LOUISIANA

- Lehmann's Seed Store
Baton Rouge, La.
- Reuter Seed Co.
New Orleans, La.
- Steckler Seed Co., Inc., J.
New Orleans, La.
- Idlewild Dairy Farm, The (White Clover)
Patterson, La.

MARYLAND

- Baltimore Seed & Feed Co.
Baltimore, Md.
- Belt Seed Co.
Baltimore, Md.
- Blamberg Bros., Inc.
Baltimore, Md.
(See Adv. Index Page 178)
- Bolgiano Seed Co., J.
Baltimore, Md.
- Scarlett & Co., Wm. G.
Baltimore, Md.

MASSACHUSETTS

- Breck & Sons Corp., Jos.
Boston, Mass.
- Dickinson Co., The Albert
Boston, Mass.
- Emerson Co., Thos. W.
Boston, Mass.
- Grey Co., Thos. J.
Boston, Mass.
- Cobb, F. W.
Franklin, Mass.
- Buck & Co., E. A.
Palmer, Mass.
- Ross Bros. Co.
Worcester, Mass.

MICHIGAN

- King & Sons, H. C.
Battle Creek, Mich.
(See Adv. Index Page 178)
- Detroit International Sales Co.
Detroit, Mich.
- Burroughs & Son, J. P.
Flint, Mich.
- Isbell Seed Co.
Jackson, Mich.
(See Adv. Index Page 178)
- McLaughlin Ward & Co.
Jackson, Mich.
- Chatterton & Sons (Rosen Rye)
Lansing, Mich.
- Young Seed Co., Geo. W.
Owosso, Mich.

MORE THAN FOUR MILLION BUYERS

of seeds, plants, bulbs, nursery stock, pets and pet supplies,
poultry supplies and various accessories, are patrons of
SEED WORLD readers.

H.C. KING & SONS INC.
Battle Creek Michigan
 — MICHIGAN GROWN —
RED CLOVER · · · · · ROSEN RYE
MAMMOTH CLOVER · WINTER VETCH
Car Lots or Less

DAVENPORT SEED COMPANY

Wholesale Field Seeds

TIMOTHY — RED CLOVER — ALSIKE
SWEET CLOVER — ALFALFA — SUDAN

Carlots or Less — We Buy and Sell

DAVENPORT - - - - - IOWA

BLAMBERG BROTHERS, Inc.

GARDEN AND FIELD SEEDS



Importers, Wholesalers and Growers

BALTIMORE - - - - - MARYLAND

Field Seeds

Grass Seeds

Poultry Feeds

Dog Feeds

D. O. COE SEED & GRAIN CO.

(SINCE 1902)

119 E. 6th

Topeka, Kan.

WHOLESALE FIELD SEEDS—Continued

MINNESOTA

- Lyman, A. B. (Grimm Alfalfa)
Excelsior, Minn.
Farmer Seed & Nursery Co.
Faribault, Minn.
(See Adv. Index Page 178)
Dickinson Co., The Albert
Minneapolis, Minn.
Minneapolis Seed Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Northrup, King & Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Stuhr-Seidl Co.—Seed Oats
Minneapolis, Minn.
Interstate Seed & Grain Co.
Moorehead, Minn.
(See Adv. Index Page 178)
Olsen Co., N. J.
Moorhead, Minn.
Cashman Seed Co.
Owatonna, Minn.
Jameson-Hevener Co.
St. Paul, Minn.
Waconia Sorghum Mills, Inc.—Sorghum
Waconia, Minn.
(See Adv. Index Page 178)
Peterson-Biddick Co.
Wadena, Minn.
Northern Field Seed Co.
Winona, Minn.

MISSISSIPPI

- Rose Seed Co.
Clarksdale, Miss.
McInnis District Co.
Meridian, Miss.
Adams, J. B.
Fass Christian, Miss.
Vicksburg Seed Co.
Vicksburg, Miss.
Williams Co., P. P.
Vicksburg, Miss.

MISSOURI

- Peppard Seed Co., J. G.**
Kansas City, Mo.
(See Adv. Index Page 178)
Rudy-Patrick Seed Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Chesmore Seed Co.
St. Joseph, Mo.
Kellogg-Kelly Seed Co.
St. Joseph, Mo.
Mitchelhill Seed Co.
St. Joseph, Mo.
Bushnell & Co., D. I.
St. Louis, Mo.
Cornell Seed Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Kaercher Seed & Supply Co.
St. Louis, Mo.
Mangelsdorf & Bro., Ed. F.
St. Louis, Mo.
(See Adv. Index Page 178)
Plant Seed Co.
St. Louis, Mo.
Prunty Seed & Grain Co.
St. Louis, Mo.
Springfield Seed Co.
Springfield, Mo.
Wood-Beazley Seed Co.
Springfield, Mo.

MONTANA

- Northern Montana Alfalfa Growers' Assn
Glasgow, Mont.
Barkemeyer Grain & Seed Co. —
Great Falls, Mont.
Snell Bros. (Grimm Alfalfa)
Miles City, Mont.

NEBRASKA

- Gilmore, E. L. C. (Seed Corn)
Ashland, Neb.
Pease Grain & Seed Co.
Beatrice, Neb.
Sonderegger Seed & Nursery House
Beatrice, Neb.
Aye Bros.
Blair, Neb.
Platte Valley Seed Co.
Grand Island, Neb.
Lawson Hardware Co., C. K.
Hastings, Neb.
Patterson & Co.
Kearney, Neb.
Grissold Seed & Nursery Co.
Lincoln, Neb.
(See Adv. Index Page 178)
Gunn Seed Co.
Lincoln, Neb.
Haley-Neeley Co.
Norfolk, Neb.
(See Adv. Index Page 178)
Nebraska Seed Co.
Omaha, Neb.
Ranney Seed Co., C. A.
Omaha, Neb.

NEW HAMPSHIRE

- Holbrook Groc. Co.
Keene, N. H.
Varick Co., Jno. B.
Manchester, N. H.

NEW JERSEY

- Riverview Farms
Bridgeton, N. J.
Doughten Seed Co., The
Jersey City, N. J.

NEW MEXICO

- Patterson Seed Co.
Clovis, N. Mex.
Mitchell, E. W.
Roswell, N. Mex.

NEW YORK

- Barber & Bennett, Inc.
Albany, N. Y.
Hickox-Rumsey Co., Inc.
Batavia, N. Y.
Conklin & Son, E. W.
Binghamton, N. Y.
Smith-Conklin Co.
Binghamton, N. Y.
Danish Seed Growers Sales Co., Inc.
Brooklyn, N. Y.
(See Adv. Index Page 178)
Craver-Dickinson Seed Co.
Buffalo, N. Y.
Dickinson Co., The Albert
Buffalo, N. Y.
Harvey Seed Co.
Buffalo, N. Y.
(See Adv. Index Page 178)

**Patronize those who made it possible to publish
this Directory.**

See Advertisers' Index on page 178.

M Brand Seeds Are
Selected for
Purity, Germination
Adaptability
Known
Origin

SELECTED
M
 FIELD SEED
 ST. LOUIS

CAR
 LOTS
 OR
 LESS

Alfalfa, Clovers,
 Timothy, Redtop,
 Grasses, Soy-
 beans, Cowpeas,
 Sudan, Cane,
 Millets, Sun-
 flower, Grains
 and other Seeds

Ed. F. Mangelsdorf & Bro.

Wholesale Field Seeds
 Cable Address: EMBRO-ST. LOUIS
 500 S. FIRST ST. ST. LOUIS, MO.

BUYERS—SELLERS
EXPORTERS

Wholesale Field Seeds

WE SPECIALIZE IN
HARDY
NORTHERN GROWN

SWEET CLOVER
RED CLOVER
ALSIKE
TIMOTHY
SEED GRAIN
POULTRY
MILLET

MINNEAPOLIS
SEED CO.

MINNEAPOLIS, MINN.

SEEDS

Sweet Clover
Alfalfa
Cane
Millet

Ask for Samples
 and Prices

Carloads or Less

Griswold Seed
and Nursery Co.
 Lincoln, Nebr.

Wholesale Seeds

Buyers and Sellers

FIELD SEEDS
GARDEN SEED
FODDER CROPS
 and
SPECIALTIES



CORNELI
SEED COMPANY
 St. Louis

WHOLESALE FIELD SEEDS—Continued

Stanford Seed Co.
Buffalo, N. Y.
Whitney-Eckstein Seed Co.
Buffalo, N. Y.
Whitney-Noyes Co.
Buffalo, N. Y.
Pierpont & Smith
Cassadaga, N. Y.
Forrest Seed Co., Inc.
Cortland, N. Y.
(See Adv. Index Page 178)
Burt Co., William D.
Dalton, N. Y.
Page Seed Co.
Greene, N. Y.
(See Adv. Index Page 178)
Mastin, Cornelius H.
Newburgh, N. Y.
Vail, Harry
New Milford, N. Y.
Amtorg Trading Corporation
New York, N. Y.
(See Adv. Index Page 178)
Doughten Seed Co.
New York, N. Y.
Lochner & Co., Inc.
New York, N. Y.
(See Adv. Index Page 178)
Nungesser-Dickinson Seed Co.
New York, N. Y.
Scandinavian Seed Co.
New York, N. Y.
Steinhardt & Nordlinger
New York, N. Y.
Stump & Walter Co.
New York, N. Y.
(See Adv. Index Page 178)
Williamson, Garfield
New York, N. Y.
McCann, Jno. J.
Poughkeepsie, N. Y.
James Vick's Sons
Rochester, N. Y.
Metcalf & Son, Inc., B. F.
Syracuse, N. Y.
Saul, C. F.
Syracuse, N. Y.

NORTH CAROLINA

Asheville Seed Co.
Asheville, N. C.
Buxton White Seed Co.
Elizabeth City, N. C.
Huske Hardware House
Fayetteville, N. C.
Catawba Seed Store
Hickory, N. C.
Parker & Co., J. H.
Newbern, N. C.
Wyatt & Sons Co., Job P.
Raleigh, N. C.
Rowan Seed Store
Salisbury, N. C.
Roudabush & Co., W. P.
Wilmington, N. C.

NORTH DAKOTA

Dacotah Seed Co.
Bismarck, N. D.
(See Adv. Index Page 178)
Interstate Seed & Grain Co.
Fargo, N. D.
(See Adv. Index Page 178)

Magill & Co. (Operating Fargo Seed House)
Fargo, N. D.

(See Adv. Index Page 178)
Grand Forks Seed Co.
Grand Forks, N. D.
Valker-Christensen Co.
Minot, N. D.

OHIO

Gerber & Son, Seth
Baltic, Ohio
Healy Seed Co.
Belle Center, Ohio
Holmes Seed Co.
Canton, Ohio
Haile & Sons, J. C.
Cincinnati, Ohio
Market Gardeners' Seed Co.
Cincinnati, Ohio
(See Adv. Index Page 178)
McCullough Seed Co., The J. Chas.
Cincinnati, Ohio.
McCullough's Sons Co., The J. M.
Cincinnati, Ohio
(See Adv. Index Page 178)
Van Atta Seed Co., D. R.
Cincinnati, Ohio
Botzum Seed Co.
Cleveland, Ohio
Chandlers Sons, C.
Cleveland, Ohio
Kelly Co., The
Cleveland, Ohio
Lorenz, Chas. E.
Coshocton, Ohio
Davis, Henry
Findlay, Ohio
Hoyt Co., The A. C.
Fostoria, Ohio
O. & M. Seed Co. (Seed Oats and Seed Corn)
Green Springs, Ohio
(See Adv. Index Page 178)
Elkenberry Bros. Co.
Hamilton, Ohio
(See Adv. Index Page 178)
Lexington Elev. & Mill Co.
Lexington, Ohio
Ackerman Co., The
Lima, Ohio
(See Adv. Index Page 178)
Scott & Sons Co., O. M.
Marysville, Ohio
Shepard Co., O. C.
Medina, Ohio
Johnson, J. W.
Napoleon, Ohio
Scarff & Sons, W. N.
New Carlisle, Ohio
Bachrach & Co., M.
Plymouth, Ohio
Roberts & Harpster
Thornville, Ohio
Sneath-Cunningham Co.
Tiffin, Ohio
Saunders Seed Co.
Tippecanoe City, Ohio
Churchill Grain & Seed Co.
Toledo, Ohio
Flower Co., S. W.
Toledo, Ohio
Hirsch & Sons, Henry
Toledo, Ohio
(See Adv. Index Page 178)

USE THE STICKER!

(See page 179)

It is a guarantee of the best of service.

Sweet Clover Seed

Buy Hardy Northern Grown Seeds. We specialize in marketing seeds grown in our territory and under rigorous climatic conditions. We furnish these seeds in carloads but are always glad to quote on less than carload shipments also.

Write for Quotations.

**Sweet Clover—Bromus Inermis—Red Clover—
Grimm Alfalfa—Timothy—Slender Wheat Grass**

Established since 1887

MAGILL & CO., Operating Fargo Seed House, FARGO, N. DAK.

Northern Grown Seed Grains

Such as

Seed Corn, Marquis Wheat,
Seed Flax, Seed Oats, Seed
Barley, Bromus Inermis,
Wheat Grass, Alfalfa, etc.

We manufacture a complete line of
Poultry and Stock Feed, and invite
correspondence.

DACOTAH SEED COMPANY,
Bismarck, No. Dakota



THE EIKENBERRY STORES
CHAIN STORE RETAILERS

**Farm and Truck
Seeds
and
All Seedmen's Side
Lines**

To Reach Purchasing De-
partment address all
correspondence
to

**THE
EIKENBERRY BROS. CO.**
701 Maple Avenue
HAMILTON, OHIO

GROWERS

of

**Field Corn
Garden Corn
Soybeans
Seed Oats**

Correspondence
Solicited

**THE O & M SEED
COMPANY**

Green Springs

Ohio

WHOLESALE FIELD SEEDS—Continued

King & Co., C. A.
Toledo, Ohio
Premier Seed Co.
Toledo, Ohio
Zahm & Co., J. F.
Toledo, Ohio
Wooster Grain & Seed Co.
Wooster, Ohio

OKLAHOMA

Oklahoma Improved Seed Co.
Chickasha, Okla.
Binding-Stevens Co.
Muskogee, Okla.
Muskogee Seed House
Muskogee, Okla.
Binding-Stevens Seed Co.
Tulsa, Okla.

OREGON

Murphy Seed Store
Albany, Ore.
Senders & Co., M.
Albany, Ore.
Hershberger, Lee L.
Independence, Ore.
Lilly Co., The Chas. H.
Portland, Ore.
(See Adv. Index Page 178)
Portland Seed Co.
Portland, Ore.
White & Sons, D. A.
Salem, Ore.
Jenks White Seed Co.
Salem, Ore.
Vollstedt, W. A.
Tangent, Ore.
(See Adv. Index Page 178)

PENNSYLVANIA

Klingler & Co., H. J.
Butler, Pa.
Schell, Inc., Walter S.
Harrisburg, Pa.
(See Adv. Index Page 178)
Hoffman, Inc., A. H.
Landisville, Pa.
Shenk & Sons, S. E.
Newville, Pa.
Atlantic Seed Co.
Philadelphia, Pa.
Philadelphia Seed Co.
Philadelphia, Pa.
(See Adv. Index Page 178)
Seaboard Seed Co.
Philadelphia, Pa.
(See Adv. Index Page 178)
Dickinson Co., The Albert
Pittsburgh, Pa.
Scott Co., I. W.
Pittsburgh, Pa.
Hertzog, H. F.
Reading, Pa.

SOUTH CAROLINA

Mixson Seed Co., W. H.
Charleston, S. C.
Kirkland Seed Co., B. B.
Columbia, S. C.
Bryson Holcombe Seed Co.
Greenville, S. C.
Burr Clover Farms (Bur Clover)
Rock Hill, S. C.

SOUTH DAKOTA

Sexauer & Son, George P.
Brookings, S. D.
Dakota Improved Seed Co.
Mitchell, S. D.
Haley-Neeley Co.
Sioux Falls, S. D.
(See Adv. Index Page 178)
Gurney Seed & Nursery Co.
Yankton, S. D.

TENNESSEE

Wheeler Co., Dan C.
Chattanooga, Tenn.
English & Sons, W. H.
Franklin, Tenn.
Fleming, S. M.
Franklin, Tenn.
West & Rue
Franklin, Tenn.
Hackney, Kearns & Lackey
Knoxville, Tenn.
Mayo, D. R.
Knoxville, Tenn.
Cook, L. P.
Memphis, Tenn.
Mosby Seed Co., John
Memphis, Tenn.
Russell-Heckle Seed Co.
Memphis, Tenn.
Schwill & Co., Otto
Memphis, Tenn.
Dodson-Hicks Co.
Nashville, Tenn.
Hill & Co., Chas. H.
Nashville, Tenn.
McKay-Reece Co.
Nashville, Tenn.
Rose & Co., G. P.
Nashville, Tenn.
Cole Seed Saver Co.
Newbern, Tenn.
Collins Company, The
Winchester, Tenn.

TEXAS

Kearns Grain & Seed Co., Inc.
Amarillo, Texas
(See Adv. Index Page 178)
Eastern Seed Co.
Corpus Christi, Tex.
Nicholson Seed Co., Robert
Dallas, Texas
Sherman-Magnolia Seed Co.
Dallas, Texas
The American Seed Co.
Fort Worth, Texas
Ferguson Seed Farms
Sherman, Texas

UTAH

Farr, Thos.
Ogden, Utah
Bailey & Sons Co.
Salt Lake City, Utah
Kelly Western Co.
Salt Lake City, Utah
Occidental Seed Co.
Salt Lake City, Utah

**Let SEED WORLD Service Bureau help you.
No charge. Just write us and we will do the rest.
SEED WORLD, 1018 So. Wabash Ave., Chicago**

Why Don't You Try Schell's?

It seems when some items are scarce and almost impossible to get anywhere—you can get them at Schell's.

They carry big stocks and have a reputation for quality that is not excelled anywhere.

You get highest quality and real service from them.

Try them next time you need any item in Garden or Flower Seeds.

Their address is

Schell's Seed House

or

Walter S. Schell, Inc.

Tenth and Market Sts.
Harrisburg, Pa.

It is a very, very busy place and it is amazing to see the number of orders they fill.

**Seaboard
Seed Company**
H. W. DOUGHTEN, Pres.

*Wholesalers
Importers
Exporters*

of

*Farm
Field
Fancy Grass
Seeds*

Central Offices & Warehouse
Front and Bainbridge St.
Philadelphia
Branch: Lancaster, Pa.

QUALITY SEEDS

SUDAN

Bulk Country Run or Recleaned,
Tested and Tagged—Prompt or
Deferred Shipments.

Millet Cane Feterita
Hegari Darso
Kafir Milo

TEXAS RED
RUST PROOF OATS

Originators with 7 Coun-
try Elevators and connec-
tions in nearly every town
in the Panhandle.

Kearns Grain & Seed Co.

AMARILLO, TEXAS
CAR LOTS OR LESS

Field Seeds

*Wholesale
Dealers*

When in the Market
for

**TIMOTHY
CLOVER
ALSIKE**

Write

THE ACKERMAN Co.
LIMA, OHIO

WHOLESALE FIELD SEEDS—Continued

Western Seed Marketing Co.
Salt Lake City, Utah

VERMONT

Middlebrook & Sons, J. C.
Burlington, Vt.
Burdett Bros.
Rutland, Vt.

VIRGINIA

Bryant's Son, Herbert,
Alexandria, Va.
May & Son, Inc., W. H.
Alexandria, Va.
Vance & Co., Jas. L.
Chilhowie, Va.
Pritchett & Son, Jas. I.
Danville, Va.
Smith Seed & Feed Co.
Danville, Va.
Jordan Seed & Fertilizer Co.
Dublin, Va.
Wetsel Seed Co.
Harrisonburg, Va.
Lynchburg Seed Co.
Lynchburg, Va.
Charlton, E. H.
Norfolk, Va.
Grossman & Son, W.
Petersburg, Va.
Roper & Co.
Petersburg, Va.
Beveridge & Co., S. T.
Richmond, Va.
Boehling & Co., F. H.
Richmond, Va.
Carter-Venable Co., Inc., The
Richmond, Va.
Diggs & Beadles
Richmond, Va.

Virginia Seed Service
Richmond, Va.
Wood & Sons, T. W.
Richmond, Va.
Implement & Seed Co.
Roanoke, Va.
Roanoke Seed & Supply Co.
Roanoke, Va.
Slate Seed Co.
South Boston, Va.
Pinner & Co.
Suffolk, Va.
Winchester Seed Co., Inc.
Winchester, Va.

WASHINGTON

Lilly Co., Chas. H.
Seattle, Wash.
(See Adv. Index Page 178)
Northwest Seed Co.
Seattle, Wash.
Inland Seed Co.
Spokane, Wash.
Spokane Seed Co.
Spokane, Wash.

WISCONSIN

Knauf & Tesch
Chilton, Wis.
Henry Michels Seed Co.
Fond du Lac, Wis.
Courteen Seed Co.
Milwaukee, Wis.
Kellogg Seed Co.
Milwaukee, Wis.
North American Seed Co.
Milwaukee, Wis.
Teweles Seed Co., L.
Milwaukee, Wis.
Cochrane Seed Co., T. H.
Portage, Wis.

HERBST BROTHERS

Established 1876

43 South Street

New York, N. Y.

Agents for T. Sakata & Co., Yokohama

FLOWER SEEDS**VEGETABLE SEEDS****WHITE CLOVER****FANCY GRASSES**

SAKATA'S Oriental vegetable seeds; Pe-Tsai and Wong Bok
Cabbage, Turnips, Mustard, Greens.

Specialty: Domestic and Foreign Tree and Shrub Seed for
Nurserymen.

We have our own Warehouse at New York, to handle
your consignments.

THE CHAS. H. LILLY CO., SEATTLE, WASH.

ESTABLISHED 1885

GROWERS:

Cabbage, Beet, Turnip, Spinach, Kale, Parsnip,
Rutabaga, Swiss Chard, etc.



SHIPPERS: Ryegrass, Creeping Bent, Red
Clover, Vetch, Dwarf Essex, Rape (Domestic)

HAMILTON SEED and COAL CO.

CEDAR RAPIDS

IOWA

WHOLESALE DEALERS

**TIMOTHY - ALSYKE
RED CLOVER - ALFALFA**

We specialize in

Red Clover

Fescues

Argentine Corn

Vetch

Bent

Canary Seed

Rape

Poa Trivialis

Hemp Seed

White Clover

Rye Grasses

Sunflower Seed

An opportunity to quote will be welcomed!

THE PHILADELPHIA SEED CO.

103-105 Arch Street

Philadelphia, Pa.

DAKOTA No. 12 ALFALFA

HUBAM SWEET CLOVER

WHITE BLOSSOM SWEET CLOVER

YELLOW BLOSSOM SWEET CLOVER

Car Lots or Less

WERTZ SEED COMPANY

SIOUX CITY

IOWA

Africa
 Argentine
 Australia
 Belgium
 Brazil
 Canada
 Canary Islands
 Czecho Slovakia
 Denmark
 England
 Finland
 France
 Germany
 Hawaii
 Holland
 Honolulu
 Hungary
 India
 Ireland
 Italy
 Japan
 Latvia
 Manchuria
 Mexico
 New Zealand
 Norway
 Poland
 Porto Rico
 Russia
 Scotland
 Sweden
 Switzerland
 Tasmania

DO YOU KNOW that SEED WORLD

is
 read
 by the
 important
 Seed Dealers in
 33 FOREIGN
 COUNTRIES

YOU CAN CONTACT

influential foreign trade as
 well as secure a complete
 coverage of the American
 seed trade field through the
 advertising columns of

SEED WORLD

SWEET CLOVER

OUR SPECIALTY

SHIPPERS OF
**Medium Red, Alsyke
 Timothy, Bromus
 Early Ohio and
 Cobbler Potatoes**

ASK FOR OUR QUOTATIONS

Interstate Seed & Grain Co.
 FARGO, N. D.

FARMER SEED

AND NURSERY Co.

FARIBAULT, MINN.

Northern Grown
SWEET CORN
 AND
FIELD CORN

SPECIALIZING IN
 Early Golden Sunshine
 and Golden Bantam
 Sweet Corn

We Buy and Sell

**Red, White and
 Alsyke Clover,
 White and Yellow
 Blossom Sweet Clover,
 Alfalfa, Blue Grass,
 Red Top, Millet,
 Cane, Kaffir and all
 seed grains**

*Correspondence
 solicited.*

Ouren Seed Company
 Council Bluffs, Iowa

THE SALINA PRODUCE CO.

INC.

Salina, Kansas



**WHOLESALE FIELD
SEEDS**

**All varieties Sorghum Cane
 Seed, Milo, Kafir Corn,
 Millet, etc.**

Country Run or Recleaned



ASK US FOR PRICES

FOREIGN FIELD SEEDS

ARGENTINE REPUBLIC

Aron & Destefanis
Buenos Aires, Argentine
Bridger & Co.
Buenos Aires, Argentine
Crawford, Hammond & Co.
Buenos Aires, Argentine

AUSTRALIA

Anderson & Co., Ltd., Seedsmen
Sydney, N. S. W., Australia
Brunnings Pty. Ltd., F. H.
Melbourne, Australia
Farmer & Co., Pty., Ltd.
Melbourne, Australia
Hillsdon Watts, Ltd.
Macot, Sydney, Australia
(See Adv. Index Page 178)
Law, Somner & Co.
Melbourne, Australia
Levien & Son
Melbourne, Australia
Peterson Bros. & Craig, Ltd.
Brisbane, Queensland, Australia
Rallton & Co.
Melbourne, Australia
Shepherd & Sons, Ltd.
Sydney, Australia
Yates & Co., Ltd., Arthur
Sydney, N. S. W., Australia

AUSTRIA

Bruder Schmeichler
Vienna, Austria
Gebrüder Boschan
Vienna, Austria

BELGIUM

Geens, Francois
Allee Verte 47, Brussels, Belgium.

CZECHO SLOVAKIA

Arnost Bahlens
Prague, Czecho Slovakia
Bruder Löwenthal
Brno, Czecho Slovakia
Donat & Schuftan
Prague, Czecho Slovakia
Grunhut & Fanta
Prague, Czecho Slovakia
Hollander, Jakob
Kosice, Czecho Slovakia
Loewenthal Brothers
Brno, Czecho Slovakia
Sachsel & Sons, E.
Prague, Czecho Slovakia
Schon, Jacob S., Ltd.
Brno, Czecho Slovakia

DANZIG

Feldsaat Grosshandels-Vermittelungs
Nasiona, G. M. B. H., Danzig
Goldfarb, L. D.
Danzig
Gross & Co., N.
Danzig
"Nasiona"
Milchkannengasse 25, Danzig
(See Adv. Index Page 178)
Sativa Schwedisch-Danziger Saathandle,
A. G.
Danzig

DENMARK

Danielsen, E., & Larsen, A. S.
Nakskov, Denmark
Daehnfeldt, L., & Theodor Jensen
Odense, Denmark
Frokompagniet, A. S.
Maribo, Denmark
Hartmann & Co., Hjalmar
Copenhagen, Denmark

Helm-Peterson, J. C.
Aarhus, Denmark
Hennings, H.
Copenhagen, Denmark
Hvid, Sylvester
Copenhagen, Denmark
Madsen & Co. Thos.
Slagelse, Denmark
Nissen, Fr.
Copenhagen, Denmark
Nordisk Fro Kontor
Copenhagen, Denmark
Olsen, Chr.
Odense, Denmark
Ostergaards Froval
Stensballe, Horsens, Denmark
Scandinavian Seed Co.
Copenhagen, Denmark
Scandinavian Fro Komp
Copenhagen, Denmark
Scandinavisk Agricultur
Copenhagen, Denmark
Stallknecht & Meyer
Copenhagen, Denmark
Trifolium
Copenhagen, Denmark
Veit, Simon
Havengate 41, Copenhagen, Denmark

ENGLAND

Allester, Ltd., David
London, England
Bell, E. & Son
Cambridge, England
Bryce, G. & Co.
London, England
Buckland, Son & Co., J. W.
Worcester, England
Burlingham, G. & Sons, Ltd.
Bury St. Edmunds, England
Cundy, Chas., & Son
Sudbury, Suffolk, England
Dalgety, Company, Ltd.
London, England
Dixon, E. P. & Sons
Hull, England
Eastes & Loud
Ashford, Kent, England
**Eastern Counties Farmers' Co-Operative
Assn., Ltd.**
86 Princess Street, Ipswich, England
(See Adv. Index Page 178)
Gascon Son & Buckland
23 Sansome St., Worcester, England
Goldsmith Bros., Ltd.
Bury St. Edmunds, England
Hasler & Co., Ltd.
Dunmow, Essex, England
Hipwell & Sons
Bedford, England
Hurst & Son
London, England
Innes, W. G. & Co.
3 Crosby Square, London, England
Jacobowitz & Co., Ltd.
London, England
Johnson & Son, Ltd., W. W.
Boston, England
Jordan & Addington
St. Neots, England
King & Co., Ltd., E. W.
Coggeshall, Essex, England
(See Adv. Index Page 178)
Le May & Co., C. W.
London, England
Lincoln, T. H. & Co.
Boston, Lincs., England
McMaster & Frankish
Seething Lane, London, England
Picard, John & Co.
59 Mark Lane, London, E. C., England
Pope & Chapman, Ltd.
Bishop's Stortford, England

If You Want
POLISH

White Clover
Vicia Villosa
Bastard Clover
Red Clover
etc., etc.

—
ask for offers
—

“NASIONA”, Danzig
Milchkannengasse 25
Cable Address “Nasiona”

ACTUAL GROWERS

of

Selected **ENGLISH** Seeds

Beet, Broccoli, Brussels
Sprouts, Cabbage, Parsnip,
Parsley, Radish, Mangel,
Swede Turnip

SWEET PEAS

We are Great Britain's largest
growers, and foremost
NOVELTY RAISERS

Cultivations on own farms
under constant supervision.
(1500 acres)

Ask for **GROWERS** prices.

E. W. KING & CO., Ltd.

Coggeshall, Essex, Eng.

Cables: “King, Coggeshall”

FINEST STOCKS OF BROAD-LEAF RED CLOVER, GIANT WHITE CLOVER

and

ALL OTHER AGRICULTURAL SEEDS

(Direct from the bleak East Coast of England)

CABLE US FOR OFFERS STATING REQUIREMENTS

Eastern Counties Farmers' Co-Operative Association, Ltd.

86, PRINCES STREET, IPSWICH, ENGLAND

(The largest Seed Cleaners in the U. K.)

Cable address:
“Farmers Ipswich”

Codes—A. B. C. 5th edit.
Acme, Blitz.

AUSTRALIAN GRASS SEEDS

Paspalum Dilatatum, Rhodes Grass, Rescue Grass, Sudan Grass
Browntop (Colonial Bent), Carpet Grass (Paspalum
Compressum), Etc., Etc.

HILLSDON WATTS, LTD., MASCOT

(Wholesale Only)

SYDNEY

Cable Address
“Horticole” Sydney

CODES:

Western Union Five-Letter Edition
A. B. C. 5th Edition
Private

AUSTRALIA

Please communicate with
American Agents,
McHutchison & Co.,
95 Chambers St.,
New York, N. Y.

FOREIGN FIELD SEEDS—Continued

Taylor Pyemont & Co.
Tythebarn St., Liverpool, England
Thompson, Jas. & Sons
36 High St., Hull, England
Toogood & Sons, Ltd.
Southampton, England

Ward & Co., Ltd.
Bristol, England

Webb & Sons, Ltd., Edward
Stourbridge, England
(See Adv. Index Page 178)

Whalley, Ltd., Thomas
Liverpool, England
Woods, Sadd, Moore & Co., Ltd.
London, Norfolk, England

Yates & Sons
Cheltenham, England

ESTHONIA

Esthonian Seed Co.
Tallinn, Esthonia
Tonisson & Bros.
Tartu, Esthonia

FINLAND

Aktiebolaget Argos
Helsingfors, Finland

FRANCE

Beillard, Frederic
Le Mans, France
Bernard, Paul
Isle Sur Sorgue, France
Bonnichon
St. Amand, France
Cherot, Michael (broker)
Paris, France
Clause, L.
Bretigny-Sur-Orge, Seine-et-Oise,
France
Cretin, L. & Co.
Charlieu, France
Desjoberg & Fils, E.
Moulins, France
Galabert, Fnd.,
Caussade (Tarn-et-Garonne), France
Guignard, A.
Tours, France
Henriquez & Co., Georges
48 Rue de Loudres, Paris, France
Lafond, Theophile
Montelimar, France
Le Grand & Cie.
Moulins, France
Le Platre, P. & J.
Paris, France
Les fils de l'abbé Leplatre
Artenay-Loiret, France
Loras Freres
Lyons, France
Lucereau-Boussard
Chartres, France
Morrin-Gessat
Aubigny, France
Palisse, H. & L. Founder
Chateauroux, France
Plancharde, Cayla & Lévy
Rue J. J. Rousseau, Paris, France
Plessis & Cie., A.
18 Rue Sauval, Paris, France
Ravaud, A. (broker)
Paris, France
Rouget & Van de Walle
Rue J. J. Rousseau 23, Paris, France
Rousett & Fils
38 Rue de Louvre, Paris, France
Simon Louis Freres & Cie
Bruyeres-le-Chatel (Seine et Oise)
France
Societe d'exportation des graines de
Provence
Graveson, France
Tezier Freres
Paris, France
(See Adv. Index Page 178)

Vannier, A.
Vierzon, France
Zidranski, Chas. (Sworn Broker)
27 Rue J. J. Rousseau,
Paris, 1er Arrdt., France

GERMANY

Appel, Conrad
Darmstadt, Germany
Becker, Hch. A.-G.
Heilbronn A. N., Germany
Bitterhoff Sohn, August
Berlin O.34, Germany
Boettcher, Jun., Otto
Gross-Tabarz (Thuer.), Germany
Boettcher & Voelcker
Tabarz in Thuringen, Germany
Boettcher, Inc., Otto
Tabarz in Thuringen, Germany
Christensen, V. L.
Erfurt, Germany
DeWit, John (Broker)
Hamburg, Germany
Ernst und von Spreckelsen
Hamburg, Germany

Fiegl, Benno

Berlin, Germany

(See Adv. Index Page 178)

Friedeberts Wive, Gustav
Stettin, Germany
Funk & Kerstan
Stettin, Germany
Gebruder Dippe, A. G.
Quedlinburg, Germany
Gebruder Kallmeyer, A. G.
Erfurt, Germany

Geucke, Rudolf

Hamburg, Germany

(See Adv. Index Page 178)

Goerlitz, Theod. A.-G.
Breslau, Germany
Haage, Franz Anton
Erfurt, Germany
Hirsch, S.

Frankfurt, A. M., Worms, Berlin,
Germany

Karkutsch & Co.
Stettin, Germany
Keller Sohn, Heinrich,
Darmstadt, Germany
Knoll, K.

Bamberg, Germany
Le Coq & A. G., A.
Darmstadt, Germany
Liefmann'Söhne Nachf., R.

Hamburg, Germany

Metz & Co.
Berlin-Steglitz, Germany
Müller & Co., D.
Hamburg, Germany
Noth, Jr., Johs
Fischbach (Gotha), Germany

Nungesser, L. C.
Griesheim near Darmstadt, Germany
Pehle & Beckmann

Leer in Ostfriesland, Germany
Robra, Carl
Aschersleben, Germany
Schott, Gustav

Aschaffenburg, Germany
Weise & Pfaffe
Halle, Germany

Wissinger, G.m.b.H., A. & W.
Berlin, SO.33, Germany

Zuelzer, Gustav
Hamburg, Germany

HOLLAND

Barenbrug, Burgers & Co.
Arnhem, Holland
Busgers, W. E. & Co.
Arnhem, Holland
De Groot Van Nes & Co.,
Rotterdam, Holland



Exporter of **FANCY GRASSES**

As a Seed Dealer with long American experience and a thorough knowledge of all European producing sections I can guarantee satisfactory deliveries of high grade qualities at moderate prices.

SOUTH GERMAN CREEPING BENT GRASS

Sheeps Fescue

Crimson Clover

White Clover

Winter Vetches

Red Clover

Austrian Winter Peas

WRITE OR WIRE FOR PRICES

RUDOLF GEUCKE

HAMBURG

GERMANY

Cable Address Saatgut, Hamburg

FIELD SEEDS

Benno Fiegel A.-G. Berlin N. 24, Germany

(Since 1873)

**We Specialize in Exporting German Natural Grass
Seeds, White Clover, Hairy Vetches**

A. B. C. Code 5th Ed.

Cable address: Saatfiegel

**The Famous
Sorghum Seed**

WACONIA AMBER

A Pedigreed Pure Live Strain of Sorghum selected and developed specially for tonnage, sweetness and earliness.

Its principal advantage is in its performance. Its distinguishing features are short growing period, large tonnage for both syrup and forage, high sugar content, large seed yield and high resistance to head smut. Will send sample on request.

Produced Exclusively by

**WACONIA SORGHUM MILLS, INC.
WACONIA, MINN.**

FOREIGN FIELD SEEDS—Continued

Hermans, H. B.
Maasbracht, Holland
Hommo Ten Have's Seed Co.
Scheemda, Holland
Kleinhaus, J.
Dordrecht, Holland
Lucardie, Willem
Rotterdam, Holland
Nederlandsche Elite Zaad Maatshappy
(Sugar Beet)
Hillegom, Holland
Poortman, A.
Rotterdam, Holland
Van Beusekom, Corns.
Arnhem, Holland
Waveren's Graanhandel, N. V.
Haarlem, Holland
Wijs & Zoon, J. B.
Amsterdam, Holland
Zwaan & de Wiljes Seed Co., Inc.
Scheemda, Holland

HUNGARY

Fekete Brothers: Wholesale Seed Merchants Co., Ltd.
(See Adv. Index Page 178)
Hungarian Seed Culture Co., Ltd.
Budapest, IV, Szep-uca 1, Hungary
Kazar Brothers
Budapest, Hungary
Kertesz, Ludwig (broker)
Budapest, Hungary
Mauthner, Ltd., Edmund
Budapest, Hungary
(See Adv. Index Page 178)
"Terra" A. G.
Budapest, Hungary

IRELAND

Allan, R. & Son, Ltd.
Ballymena, Ireland
Coburn & Son, Jas.
Banbridge, Ireland
McCausland, Samuel
Belfast, Ireland
McClinton & Co.
Belfast, Ireland
Morton, Jos.
Banbridge, Ireland
Power & Co., Wm.
Waterford, Ireland

ITALY

Agostini, Giovanni
Bologna, Italy
Archibugi, Francesco
Rome, Italy
Arnstein Seed Co.
Bologna, Italy
Bubani, Luigi
Faenza, Italy
Faselo Ditta, Angelo
Forli, Italy
Lartschneider, A.
Bologna, Italy
Lormani, Achille
Bologna, Italy
Nannie, Guido
Bologna, Italy
Notari, A.
Bologna, Italy
Pessol Fratelli
Bologna, Italy
Pini, Ernesto
Bologna, Italy
Rimini, Francesco
Venezia, Italy

Scagliotti, Giacomo
Turin, Italy
Sgaravatti Bros.
Saonara, Padova, Italy
Vivanti, Alberto
Ancona, Italy

JAPAN

Sancho Schoten
Bandaido, Yokohama, Japan

JUGOSLAVIA

Jankomir d. d.
Zagreb, Croatia
Sjeme
Osijek, Slovenia
Teply, B.
Zagreb, Croatia
Todor Mraovic i Drug.
Knez Mihailova 19, Belgrade, Serbia

LATVIA

Jachmann, R.
Riga, Latvia
Translat Co., Ltd.
Riga, Latvia

NEW ZEALAND

Canterbury Seed Co., Ltd.
Christchurch, New Zealand
Cooper, F. Ltd.
Wellington, New Zealand
Dalgety & Company, Ltd.
Auckland, New Zealand
Dalgety & Company, Ltd.
Christchurch, New Zealand
Dalgety & Company, Ltd.
Dunedin, New Zealand
Dalgety & Company, Ltd.
Wellington, New Zealand
Montgomery & Co., J.
Christchurch, New Zealand
Murray, Roberts & Coy, Ltd.
Dunedin, New Zealand
National Mortgage & Agency Co. of New Zealand, Ltd.
Dunedin, New Zealand.
Nimmo & Blair, Ltd.
Dunedin, New Zealand
Paterson & Co., A. S.
Dunedin, New Zealand
Wright, Stephenson & Co., Ltd.
Wellington, New Zealand
Yates & Co., Arthur
Auckland, New Zealand

NORWAY

Bauman, Jos.
Kristiania, Norway
Eik & Housken
Bergen, Norway
Faelleskjøbet
Kristiania, Norway
Grimstad Gartneri
Grimstad, Norway
Herlofson's Frohandel
Kristiania, Norway



HUNGARIAN SEEDS!

ESTABLISHED 1874



EDMUND MAUTHNER

SEEDGROWERS & MERCHANTS CO., Ltd.

BUDAPEST
HUNGARY

Cable: Mauthnerek, Budapest

Codes: A B C 6th Ed.

Bentleys Woods A. G., Etc.

RED CLOVER
WHITE CLOVER
CRIMSON CLOVER
HAIRY VETCH
SPRING VETCH
HUNGARIAN VETCH
(VICIA PANNONICA)

AUSTRIAN WINTER PEAS
PUMPKIN SEED
SUNFLOWER SEEDS
SEED PEAS AND BEANS

THE LARGEST SEED HOUSE OF CENTRAL EUROPA!

**EXPORTERS
AND
SPECIALISTS
OF**

We Specialize in

All kinds of Clover Seeds and
Grass Seeds, Vetches, Win-
terpeas, Oilseeds, Rapeseeds,
Pumpkins, Coriander, Poppy-
seeds, Millets

Also
IN DRY LEGUMES

Peabeans, Mediumbeans,
Cranberrybeans, Giant and
Mammoth Turkishbeans, etc.
Greenpeas, Yellow-Victoria-
peas, Telephon-peas, Lentils

QUICK SHIPMENTS
SATISFACTORY QUALITIES
Ask for Samples and Price Lists

American Trade Our Specialty
Since 1870

Fekete Brothers: Wholesale Seed
Merchants Co., Ltd.

(Formerly Gebruder Schwartz)

Budapest 4 Hungary P. O. Box 196
Cable Address "Gebruder"

CAULIFLOWER SEED

ASK

A. HANSEN

KASTRUP
AMAGER
DENMARK

Specialist—Grower Since 1873

Formerly COPENHAGEN F

FOREIGN FIELD SEEDS—Continued

Indal

Hamar, Norway

Michelet, A.

Kristiania, Norway

Norsk Proforsyning, A. S.

Hamar, Norway

Norsk Fro., A. S.

Kristiania, Norway

Norwegian Seed Culture Union

Sorlandet, Norway

Rogalands Faelleskjøb

Stavanger, Norway

POLAND

Buszczynski & Sons, K.

Warsaw, Poland

Horowitz, A. L.

Warsaw, Poland

Spira, David

Krakow, Poland

RUSSIA

Amtorg Trading Corp.

Moscow, Russia

SCOTLAND

Bell Ltd., David

Leith, Scotland

Cross Seed Co., Ltd., Alexander

Glasgow, Scotland

Donaldson & Co., John

Edinburgh, Scotland

Drummond Bros.

Leith, Scotland

Inch & Son, Robert

Leith, Scotland

Lawson & Son, Ltd., Peter

Edinburgh, Scotland

Tillie, Whyte & Co.

Edinburgh, Scotland

SOUTH AFRICA

Starke & Co., Ltd.

Mowbray, Capetown, South Africa

The Colonial Produce Co.

Oudtshoorn, So. Africa

SOUTH AMERICA

Crawford, Keen & Co.

Buenos Aires, South America

SPAIN

Bonvard-y-cya

Miguel Angel 90, Barcelona, Spain

Moderno Cultivador

Notariado 2, Barcelona, Spain

Sociedad Anonima Castane

Barcelona, Spain

SWEDEN

A-B Froculture

Goteborg, Sweden

Algot Holmberg & Son

Norrkoping, Sweden

Allmanna Svenska Utsadesaktiebolaget

Svalof, Sweden

Bauer, A-B Gust

Malmo, Sweden

Bjorkmann, A-B Co. Eftf.

Stockholm, Sweden

Dieden, J. H., Jr.

Malmo, Sweden

Engstrom, Aktiebolaget Carl

Eslof, Sweden

Ericson & Co., J. D.

Goteborg, Sweden

General Swedish Seed Co.

Svalof, Sweden

Goteborgs, Tragardsforening

Gothenburg, Sweden

Holmberg & Son, Algot

Norrkoping, Sweden

Perssons Handels A-B, Olof

Ystad, Sweden

Skans Hollands

Utsades, Sweden

Sydsvenska Utsadeskompaniet

Malmo, Sweden

Walthen & Co.

Packhusplatsen 2, Gothenburg, Sweden

SWITZERLAND

Mauser, Emil

Zurich, Switzerland

For Your Protection and Ours

USE THE STICKER!

(See Page 179)

SPECIALTIES

in Season

GRASS SEEDS

RHODES, PASPALUM, RESCUE. Ton lots direct import from Australia or from stock in San Francisco.

RAFFIA

We are the largest handlers of raffia in America. We offer three dependable brands—hundred pound lots to carloads.

GRANULATED PEAT

McH BRAND—finely pulverized in hundred kilo bales. Cheapest and best. Immediate shipping service. Carloads our specialty.

BAMBOO CANE STAKES

JAPANESE NATURAL AND DYED GREEN, AND CHINESE CANES IN BEST SIZES.

BULBS

In Best Seed Store Grades

JAP. LILIES
TULIPS
HYACINTHS
CROCUS
NARCISSI
T. R. BEGONIAS
GLADIOLI
VALLEY PIPS

GLOXINIAS
FREESIAS
CALLAS
LILIUM CANDIDUM
LILIUM REGALE
F. L. CALADIUMS
PAPER WHITES

Tell Us Which of the Above Items Interest You and Get On Our Mailing List.

McHUTCHISON & CO.

95 Chambers Street

New York, N. Y.

SEED BAG TRIERS

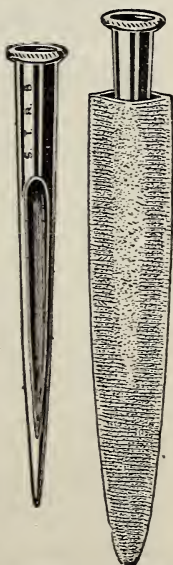
QUICK, SAFE
CON-
VENIENT

Seed triers for quick, convenient drawing of samples without opening or tearing bag. Brass with steel point heavily nickel plated, with solid leather protector.

6 inches long,
Price \$1.00 each,
\$11.00 per doz.

9 in. long, with
metal shield,
Price \$2.00 each.

12 in. long, with
metal shield,
Price \$3.00 each



SEED TRADE REPORTING BUREAU

1018 S. Wabash Ave. CHICAGO, ILL.

SELECTED FRENCH SEEDS

DIRECT FROM THE CROWERS



ESTABLISHED 1785

TÉZIER FRÈRES

Wholesale Seed Growers & Exporters

VALENCE-SUR-RHONE

FRANCE

Vegetable & Flower Seeds

Clover & Grass Seeds

CHARACTERISTICS OF VEGETABLE SEEDS

The figures in the following table are intended to be approximate only, as variations occur in varieties and are also due to conditions of growth, harvest and storage.

Vegetable	Average Germination 1 Year Old Seed	Average Duration of Germinating Power in Years	Average Number of Seeds per Ounce	Average Weight of Quart of Seed in Ounces	Amount Required for 100 Feet of Drill	Amount of Seed required Per Acre	Depth of Planting
Asparagus.....	90%	3	1,000	32	1 oz.	5 lbs.	1 in.
Beans, Dwarf	90%	3	100	30	1 lb.	60 lbs.	1 in.
Beans, Pole	90%	3	100	30	½ lb.	30 lbs.	1 in.
Beet, Garden	80%	4	1,750	10	1 oz.	6 lbs.	1 in.
Beet, Mangel	80%	4	1,200	10	1 oz.	5 lbs.	1 in.
Brussels Sprouts	85%	4	6,500	24	¼ oz.	2 oz.	½ in.
Cabbage	85%	4	5,000	24	¼ oz.	4 oz.	½ in.
Carrot	75%	3	14,000	12	½ oz.	2 lbs.	½ in.
Cauliflower	75%	4	14,000	24	¼ oz.	1 oz.	½ in.
Celery	80%	3	100,000	16	¼ oz.	4 oz.	⅜ in.
Collards	88%	3	4,500	24	¼ oz.	4 oz.	½ in.
Corn, Sweet	85%	3	125	23	¼ lb.	12 lbs.	1 in.
Cucumber	85%	5	1,000	18	½ oz.	2 lbs.	1 in.
Eggplant	75%	4	5,000	18	⅝ oz.	4 oz.	½ in.
Endive	80%	5	13,500	12	1 oz.	2 lbs.	½ in.
Kale	85%	4	7,500	24	¼ oz.	1 lb.	½ in.
Kohlrabi.....	85%	3	7,000	24	¼ oz.	1 lb.	½ in.
Leek	80%	2	8,000	18	½ oz.	4 lbs.	½ in.
Lettuce	90%	6	16,000	14	½ oz.	3 lbs.	½ in.
Melon, Musk	85%	5	1,200	12	½ oz.	2 lbs.	1 in.
Melon, Water	85%	5	225	16	1 oz.	2 lbs.	1 in.
Mustard	85%	3	18,000	30	¼ oz.	1 lb.	¼ in.
Okra	85%	1	425	20	2 oz.	8 lbs.	1 in.
Onion	80%	2	12,500	16	1 oz.	4 lbs.	½ in.
Parsley	70%	1	17,500	12	¼ oz.	3 lbs.	⅝ in.
Parsnip	75%	1	2,800	10	½ oz.	3 lbs.	½ in.
Peas	90%	3	50 to 150	30	1 lb.	60 lbs.	1 in.
Pepper	75%	2	4,000	16	⅝ oz.	2 oz.	½ in.
Pumpkin	90%	4	100	9	½ oz.	4 lbs.	1 in.
Radish	90%	4	5,000	24	1 oz.	10 lbs.	½ in.
Salsify	75%	1	4,500	12	1 oz.	8 lbs.	½ in.
Spinach	80%	3	3,000	14	1 oz.	8 lbs.	1 in.
Squash, Summer	90%	4	300	20	½ oz.	4 lbs.	1 in.
Squash, Winter	90%	4	125	14	½ oz.	2 lbs.	1 in.
Tomato	85%	3	7,500	10	⅝ oz.	1½ oz.	½ in.
Turnip	90%	4	10,000	24	½ oz.	1 lb.	¼ in.

Over four million buyers of seeds, plants, bulbs, nursery stock, pets, poultry supplies and accessories for same are patrons of SEED WORLD readers.

WHOLESALE SEED GROWER

Specialties:

BEET
CARROT
CELERY
ENDIVE
LETTUCE

MUSTARD
ONION
PARSLEY
PARSNIP
RADISH

SALSIFY
MIXED SWEET PEAS

Contract Prices for Crop 1929 Mailed on Application

GILROY, CALIF.

HOLLISTER, CALIF.

WALDO ROHNERT

GILROY

CALIFORNIA

ASPARAGUS Roots and Seeds

Shedakers Ped
Washington and
Mary Washington
roots, grown on the
famous Riverdale
farms by the larg-
est growers of as-
paragus roots in
the world.

B. D. Shedaker & Son

Riverdale Farms

Burlington

New Jersey

The C. Herbert Coy
Seed Co., Inc.
Valley, Nebraska

Growers of
Sweet, Flint and Dent
SEED CORN

Also

Cucumber, Muskmelon,
Watermelon, Squash,
Pumpkin and Gourd.

WHOLESALE ONLY

VEGETABLE PLANTING TABLE

Kind of vegetable	Seeds or roots re- quired for 100 ft. of drill	One Acre	Distance for plants to stand			Depth of planting	Time of planting in open ground		Ready for use after planting
			Rows apart		Plants apart in rows		South	North	
			Horse culti- vation	Hand culti- vation					
Asparagus, seed	1 oz.	5 lbs.	30 to 36 in.	1 to 2 ft.	3 in.	1 in.	Autumn or early sp'ng	Early spring.	2 years
Asparagus, roots	60 to 80.	1 bu.	3 to 5 ft.	12 to 24 in.	15 to 20 in.	3 to 5 in.	Autumn or early sp'ng	Early spring.	1 year
Beans, dwarf	1 pt.	1 bu.	30 to 36 in.	18 to 24 in.	2 in.	1 in.	Feb. to April (Aug. to Sept.)	April to July.	42 to 75 days
Beans, pole	1/2 pt.	1/2 bu.	3 to 4 ft.	3 to 4 ft.	3 to 4 ft.	1 in.	Late spring.	May and June.	72 to 90 days
Beets	1 oz.	6 lbs.	28 to 36 in.	12 to 18 in.	2 in.	1 in.	Feb. to April (Aug. to Sept.)	April to July.	72 to 90 days
Brussels sprouts	1/4 oz.	2 oz.	30 to 36 in.	24 to 30 in.	16 to 24 in.	1/2 in.	Jan. to July.	April to August.	45 to 60 days
Cabbage, early	1/4 oz.	1/4 lb.	30 to 36 in.	24 to 30 in.	12 to 18 in.	1/2 in.	Oct. to Dec.	Mar. and Apr. (Start in hotbed during Feb.)	100 to 120 days
Cabbage, late	1/4 oz.	1/4 lb.	30 to 40 in.	24 to 36 in.	16 to 24 in.	1/2 in.	June and July.	May and June.	90 to 110 days
Carrot	1/4 oz.	2 lbs.	30 to 36 in.	18 to 24 in.	2 in.	1/2 in.	Mar. and Apr. Sept.	April to June.	110 to 120 days
Cauliflower	1/4 oz.	1 oz.	30 to 36 in.	24 to 30 in.	14 to 18 in.	1/2 in.	Jan. and Feb. [June].	April to June.	55 to 80 days
Celery	1/4 oz.	1/4 lb.	3 to 6 ft.	18 to 36 in.	2 in.	1/2 in.	Aug. to Oct.	May & June. (Start in hotbed or cold frame during Mar. or Apr.)	95 to 110 days
Collards	1/4 oz.	1/4 lb.	30 to 36 in.	24 to 30 in.	14 to 18 in.	1/2 in.	May and June.	Late spring.	120 to 150 days
Corn, sweet	1/4 pt.	6 qts.	36 to 42 in.	30 to 36 in.	4 to every 3 ft.	1 in.	Feb. to April.	May to July.	100 to 120 days
Cress, water	1/2 oz.	2 lbs.	Broadcast.	4 to 6 ft.	4 every 3 ft.	1 in.	Early spring.	April to Sept.	55 to 90 days
Cucumber	1/2 oz.	2 lbs.	4 to 6 ft.	4 to 6 ft.	4 every 3 ft.	1 in.	Feb. and Mar. [Sept.]	April to July.	60 to 70 days
Eggplant	1/2 oz.	1/4 lb.	30 to 36 in.	24 to 30 in.	18 in.	1/2 in.	Feb. to April.	Apr. & May. (Start in hotbed during Mar.)	50 to 70 days
Endive	1 oz.	2 lbs.	30 in.	18 in.	12 in.	1/2 in.	Feb. to April.	April [July].	125 to 140 days
Kale, or borecole.	1/4 oz.	1 lb.	30 to 36 in.	18 to 24 in.	18 in.	1/2 in.	Oct. to Feb.	Aug. to Sept. [March and April].	100 days
Kohl-rabi	1/4 oz.	1 lb.	30 to 36 in.	18 to 24 in.	6 in.	1/2 in.	Sept. to May.	March to May.	55 to 60 days
Leek	1/2 oz.	4 lbs.	30 to 36 in.	14 to 20 in.	4 in.	1/2 in.	May to Sept.	March to May.	50 to 70 days
Lettuce	1/2 oz.	3 lbs.	30 in.	12 to 18 in.	6 in.	1/2 in.	Sept. to March.	March to Sept.	120 to 150 days
Muskmelon	1/2 oz.	2 lbs.	6 to 8 ft.	6 to 8 ft.	4 every 4 ft.	1 in.	Feb. to April.	April to June.	70 to 90 days
Watermelon	1 oz.	2 lbs.	8 to 12 ft.	8 to 12 ft.	4 every 4 ft.	1 in.	March to May.	May and June.	85 to 130 days
Mustard	1/4 oz.	1 lb.	30 to 36 in.	12 to 18 in.	4 or 5 to ft.	1/2 in.	Autumn or early sp'ng	March to June. [Sept.]	100 to 130 days
Okra	2 oz.	8 lbs.	4 to 5 ft.	3 to 4 ft.	24 in.	1 in.	Feb. to April.	May and June.	60 to 90 days
Onion, seed	1 oz.	4 lbs.-5 lbs.	24 to 36 in.	12 to 18 in.	2 in.	1/2 in.	Oct. to March.	April to May.	90 to 140 days
Onion, sets	1 qt.	1 qt.	24 to 36 in.	12 to 18 in.	4 or 5 to ft.	1 in.	Early spring.	Autumn and Feb. to May.	125 to 150 days
Onion seed for sets.	1 lb.	50 lbs.	24 to 36 in.	12 to 18 in.	1/2 in.	1/2 in.	Early spring.	April.	100 days
Parsley	1/4 oz.	3 lbs.	24 to 36 in.	12 to 18 in.	3 in.	1/2 in.	Sept. to May.	Sept. and early spring	90 days
Parsnip	1/2 oz.	3 lbs.	30 to 36 in.	18 to 24 in.	2 in.	1/2 in.	March and April.	April and May.	65 to 90 days
Peas	1 pt.	1 bu.	3 to 4 ft.	30 to 36 in.	1 in.	1 in.	Sept. to April.	March to June.	130 days
Pepper	1/2 oz.	2 oz.	30 to 36 in.	18 to 24 in.	15 in.	1/2 in.	Early spring.	May and June. (Start early plants in hotbed during March.)	45 to 75 days
Potatoes, Irish	5 lbs.	16 bu.	30 to 36 in.	24 to 36 in.	14 in.	4 in.	Jan. to April.	early plants in hotbed during March.)	130 to 150 days
Potatoes, sweet	3 lbs.(or 75 slips)	3 lbs.	3 to 5 ft.	3 to 5 ft.	14 in.	3 in.	April and May.	May and June.	90 to 150 days
									150 days

This Vegetable Planting Table Continued on Following Page

Sioux City Seed Co.

Sioux City, Iowa

45 Years Experience as Growers for the Wholesale Trade

Peas — Beans — Sweet Corn

We Solicit Your Inquiries for Spot Orders or Contracts
Growing Stations—Sioux City, Ia.; St. Anthony, Idaho;
Billings, Mont.; Millington, Mich.

Since 1880

GEORGE R. PEDRICK & SON

WHOLESALE SEED GROWERS

SPECIALTIES

TOMATO PEPPER EGG PLANT ASPARAGUS RHUBARB
OKRA BEANS CORN VINE SEEDS
AND MANY OTHER VEGETABLE SEEDS AND ROOTS

May we quote you on your requirements of High Grade Seeds?

GEORGE R. PEDRICK & SON

Pedricktown, N. J.

DANISH SEED GROWERS SALES CO., Inc.

4407 Sixth Avenue

BROOKLYN, NEW YORK

UNITED STATES OFFICE:

R. Wibolts Frøavl og Frøhandel, Nakskov, Denmark

Headquarters for:

Wibolts famous Express Snowball Cauliflower,
Cabbage, Turnips, and all vegetable seeds

Danish grown Orchardgrass, Poa Trivialis, and all varieties of
Danish grass seed.

BUIST'S GARDEN SEEDS

Grown from Selected Stocks
Famous for Purity and Vitality

Write for quotations before placing your order

ROBERT BUIST CO. PHILADELPHIA, PA.

Seedsman Since 1828

Vegetable Planting Table—Continued from Preceding Page

Kind of vegetable	Seeds or roots required for 100 ft. of drill	One Acre	Distance for plants to stand				Depth of planting	Time of planting in open ground		Ready for use after planting
			Rows apart		Plants apart in rows	South		North		
			Horse cultivation	Hand cultivation						
Pumpkin.....	½ oz.....	4 lbs.....	8 to 12 ft.....	8 to 12 ft.....	4 every 6 ft.....	1 in.....	April and May.....	May to July.....	75 to 90 days	
Radish.....	1 oz.....	10 lbs.....	24 to 36 in.....	12 to 18 in.....	1 in.....	½ in.....	Sept. to April.....	March to Sept.....	20 to 75 days	
Rhubarb, seed.....	½ oz.....	36 in.....	36 in.....	30 to 36 in.....	6 in.....	½ to 1 in.....	.....	Early spring.....	3 years
Rhubarb, roots.....	33 roots.....	3 to 5 ft.....	3 to 5 ft.....	3 to 5 ft.....	3 ft.....	2 to 3 in.....	.....	Autumn or early spr'g.....	1 year
Ruta-baga.....	¼ oz.....	2 lbs.....	30 to 36 in.....	18 to 24 in.....	6 in.....	½ to 1 in.....	Aug. and Sept.....	May and June.....	90 days	
Salsify.....	1 oz.....	8 lbs.....	30 to 36 in.....	18 to 24 in.....	2 in.....	1 in.....	Sept. to Feb.....	Early spring.....	150 days	
Spinach.....	1 oz.....	8 lbs.....	30 to 36 in.....	12 to 18 in.....	4 every 4 ft.....	1 in.....	Spring.....	Sept. or very e'ly sp'g.....	45 days is min.	
Squash, summer.....	½ oz.....	4 lbs.....	3 to 4 ft.....	3 to 4 ft.....	2 in.....	1 in.....	Spring.....	April to June.....	65 to 70 days	
Squash, winter.....	½ oz.....	2 lbs.....	7 to 10 ft.....	7 to 10 ft.....	4 every 6 ft.....	1 in.....	Spring.....	May to July.....	125 days	
Tomato.....	¾ oz.....	1½ oz.....	3 to 5 ft.....	3 to 4 ft.....	3 by 4 ft.....	½ in.....	Dec. to March.....	May to June.....	125 to 150 days	
Turnip.....	½ oz.....	1 lb.....	24 to 36 in.....	18 to 24 in.....	2 in.....	¾ in.....	Aug. to Oct.....	April and Aug.....	45 to 90 days	

Helpful Hints to Vegetable Gardeners

DECIDE early how much ground you will use and what you will plant. Plow or spade before the ground freezes, if you can. A little fertilizer or manure will insure better crops.

Don't cover the seed too deep. It will germinate more quickly if only a little soil is on the seed. See full cultural directions on the packets.

Leave the garden alone until the plants come up. If you have sown bulk seeds, thin rows after plants are up an inch or two. Using seed-tape reduces thinning to a minimum.

Lima beans should be planted with the eye down and covered one inch deep.

Sow radishes directly in the row with your parsley.

Order your seeds early so that you can take advantage of the first signs of spring. When you water, do it thoroughly—don't sprinkle, soak.

Plant early everything but beans, wrinkled peas, and vine crops.

If soil is dry, water may be put on. Let it run slowly and don't spare the water—it's cheap.

Don't think water will take the place of thorough cultivation—it won't.

You will have a better garden if you use the hoes more, and the hose less.

Weeds are garden robbers. Kill them when they are small.

For large head lettuce, thin out to at least six inches.

Plant enough to have some vegetables for home canning.

Buy only first-class, reputable materials, even if it means less of them.

Get a good spray and use it.

Hoe often to loosen the soil and hold moisture around the roots of the plants.

You cannot do good work with poor tools. Have a good hoe, rake, fork and spade.

A small hand cultivator will make you feel like a professional gardener. It will soon pay for itself, too.

Don't try "watchful waiting" for bugs, worms and other vermin. Swat 'em or they will spoil your plants.

Plant small, quick growers like lettuce, radishes, etc., between the rows of larger, slower maturing sorts. In the case of early sorts such as spinach, start tomatoes, corn, etc., between the rows to occupy the ground after the former is harvested.

Never cultivate or handle any kind of beans when the vines are wet. This is the easiest way to spread a serious disease and ruin the crop.

Success against weeds means keeping them out, not taking them out after they get in.

To ensure a succession of such plants as peas, beans, lettuce, radishes, beets, kohlrabi, etc., sow a fresh row every week or so.



PAGE'S Standard Quality SEEDS

VEGETABLE AND FLOWERS
SEED CORN—OATS—MILLET

Wholesale Only



THE PAGE SEED CO., Greene, N. Y.

GOOD



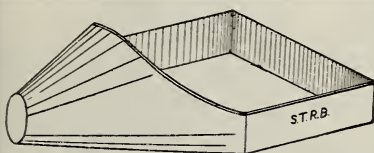
SEED

VEGETABLE and
FLOWER SEEDS

SEED CORN and
ALFALFA

Wholesalers, Importers, Growers

THE FORREST SEED CO., Inc.
CORTLAND, N. Y.



SEED AND GRAIN SAMPLE PANS

For containing grain or seed after sampling. Advantageous in making analyses and for display. Seamless Wellsville steel—dark blue and non-glaring.

No. 31—12x16x2 in.—3 qts. wheat capacity. Price each, \$1.50; half dozen, \$8.50.

No. 32—8½x12x1½ in.—1½ qts. wheat capacity. Price each, \$1.25; half dozen, \$7.00.

No. 33—Same as No. 32, Aluminum, \$1.50.

SEED TRADE REPORTING
BUREAU

1018 South Wabash Avenue
CHICAGO, ILL.

SEED GROWER

Specializing
in

TOMATO PEPPER

and

EGG PLANT

EDGAR F. HURFF

SWEDESBO
NEW JERSEY

IMPORTS AND PRICES OF VEGETABLE SEEDS

Compiled from figures published by Department of Commerce.

Kind of Seed—	Imports—Calendar Years					Average Prices†				
	Lbs. 1924	Lbs. 1925	Lbs. 1926	Lbs. 1927	Lbs. 1928*	Per lb. 1924	Per lb. 1925	Per lb. 1926	Per lb. 1927	Per lb. 1928
Beet, garden	423,057	278,753	390,042	327,268	203,465	\$.15	\$.157	\$.154	\$.163	\$.158
Beet, mangel	297,684	206,707	412,397	228,971	150,180	.114	.128	.102	.102	.111
Cabbage	209,592	125,428	326,625	275,341	119,557	.437	.496	.537	.535	.522
Carrot	134,206	40,838	57,525	29,059	41,501	.273	.402	.379	.496	.348
Cauliflower	13,754	9,043	21,883	16,643	3,553	6.06	6.93	6.30	6.396	8.391
Kale	50,421	24,787	64,760	48,025	14,458	.197	.216	.193	.18	.208
Kohlrabi	13,376	6,732	15,360	11,822	3,755	.451	.449	.439	.488	.524
Onion	104,027	17,378	360,961	252,203	21,201	1.00	.954	1.29	1.826	.612
Parsley	146,782	332,680	295,685	95,500	409,830	.122	.135	.115	.167	.136
Parsnip	57,974	35,922	41,653	32,081	13,675	.158	.145	.120	.107	.149
Pepper	3,276	2,541	5,585	3,921	1,712	.691	.654	.581	.677	.871
Radish	651,061	413,622	1,010,552	742,178	279,850	.168	.182	.160	.158	.162
Spinach	2,685,972	618,886	2,471,760	2,085,764	595,193	.083	.091	.092	.093	.114
Turnip	1,349,960	608,976	1,914,128	1,145,517	629,649	.116	.129	.112	.113	.111
Rutabaga	200,693	75,500	385,855	201,166	58,063	.12	.137	.111	.110	.127

*Six months ending June 30, 1928. †All prices are F. O. B. port of origin and not including duty.



"GROWERS OF
THE BEST"

TOMATO SEED HARVEST SCENE

TOMATO SEED
OUR SPECIALTY

We also grow HIGH QUALITY BUSH LIMA BEAN SEED
BURPEE — BURPEE IMPROVED — FORDHOOK

HAVEN SEED COMPANY

SANTA ANA

Wholesale Seed Growers

CALIFORNIA

Standard Seed Farms Company
WHOLESALE GROWERS GARDEN SEEDS
Stockton California

Growers
OF
Vegetable Seeds

SPOT

CONTRACT

Cable Address
"Stanseed"

Post Office
Box 577

BERTRAND SEED CO.

WHOLESALE GROWERS

CALIFORNIA GARDEN SEEDS
PEAS AND BEANS

SAN FRANCISCO, CAL.

SEED GROWERS — BULB GROWERS

Dealers and Importers

Field Garden and Flower Seeds

WHOLESALE AND RETAIL

Aggeler & Musser Seed Co.

LOS ANGELES, CALIF.

WHOLESALE GARDEN SEEDS

ALABAMA

- Buchanan Feed & Seed Co.
Anniston, Ala.
Poyner Seed Co.
Dothan, Ala.
North Alabama Seed Co.
Florence, Ala.
Wind & Co., I.
Huntsville, Ala.
Van Antwerp's Seed Store
Mobile, Ala.
(See Adv. Index Page 178)
Hawthorne-Jones Co., Inc.
Montgomery, Ala.

ARKANSAS

- Fort Smith Seed Co., Inc.
Fort Smith, Ark.

CALIFORNIA

- Cuff-Archias Seed Co.
Brawley, Calif.
Fish, Henry Berrien (Beans)
Carpinteria, Calif.
(See Adv. Index Page 178)
Golden State Seed Co.
Coyotes, Cal.
Aggeler & Musser Seed Co., Inc.
Los Angeles, Cal.
(See Adv. Index Page 178)
Bodger & Sons Co., John
El Monte, Los Angeles County, Calif.
(See Adv. Index Page 178)
Germain Seed & Plant Co.
Los Angeles, Cal.
(See Adv. Index Page 178)
Los Angeles Seed Co., Inc.
Los Angeles, Cal.
Morris & Snow Seed Co.
Los Angeles, Calif.
Winsel, Chas.
Los Angeles, Cal.
Lagomarsino & Sons, F.
Sacramento, Cal.
(See Adv. Index Page 178)
Laughlin Seed Co. (Onion)
Sacramento, Calif.
Ward Seed Co., Wm. A.
Sacramento, Calif.
(See Adv. Index Page 178)
Bertrand Seed Co.
San Francisco, Calif.
(See Adv. Index Page 178)
McGill Seed Co., R. C.
San Francisco, Calif.
(See Adv. Index Page 178)
Morse & Co., C. C.
San Francisco, Cal.
(See Adv. Index Page 178)
Oriental Seed Co.
San Francisco, Cal.
Pacific Seed Growers
San Francisco, Calif.
Sherwood Seed Co.
San Francisco, Calif.
California Seed Growers Assn., Inc.
San Jose, Calif.
Haven Seed Co. (Tomatoes)
Santa Ana, Calif.
(See Adv. Index Page 178)
Fish Seed Co., Henry (Beans)
Santa Barbara, Calif.
(See Adv. Index Page 178)
Knox Seed Co.
Stockton, Calif.

Standard Seed Farms Co. Stockton, Cal.

- (See Adv. Index Page 178)
Hogue-Kellogg Co., The
Ventura, Calif.
(See Adv. Index Page 178)

CANADA

- McKenzie Co., Ltd., A. E.
Brandon, Manitoba, Can.
Bruce & Co., Ltd., John A.
Hamilton, Ont., Can.
(See Adv. Index Page 178)
Gold Medal People, Ltd.
Toronto, Canada
Keith & Sons, Geo.
Toronto, Canada
Rennie Co., Ltd., Wm.
Toronto, Canada
Steele, Briggs Seed Co., Ltd.
Toronto, Canada
(See Adv. Index Page 178)

COLORADO

- Barteldes Seed Co.
Denver, Colo.
Burton Seed Co.
Denver, Colo.
Colorado Seed Co.
Denver, Colo.
Western Seed Co.
Denver, Colo.
Grand Junction Seed Co.
Grand Junction, Colo.
(See Adv. Index Page 178)
Burrell, D. V.
Rocky Ford, Colo.
Ebbert Seed Co.
Rocky Ford, Colo.
James, R. H.
Rocky Ford, Colo.

CONNECTICUT

- Associated Seed Growers, Inc.
New Haven, Conn.
Platt Company, Frank S.
New Haven, Conn.
Woodruff & Sons, S. D.
Orange, Conn.
(See Adv. Index Page 178)
Comstock, Ferre & Co.
Wethersfield, Conn.
(See Adv. Index Page 178)
Hart Seed Co., Chas. C.
Wethersfield, Conn.
(See Adv. Index Page 178)

DELAWARE

- Boggs & Son, Caleb
Cheswold, Del.

DISTRICT OF COLUMBIA

- Bolgiano & Co., F. W.
Washington, D. C.

FLORIDA

- Martin Seed Co., E. A.
Jacksonville, Fla.
Evans Seed Co.
Monticello, Fla.
Crenshaw-McMichael Seed Co.
Tampa, Fla.

GEORGIA

- Arrington Co., H. H.
Rome, Ga.
Walton Seed Co.
Augusta, Ga.

MOUNTAIN GROWN SEEDS



Earlier Maturity, Stronger Vitality and Freedom from Fungus Diseases combined with careful breeding and type selection.

"MILE HIGH" SEEDS

Growing—Sweet Corn, Cucumber, Lettuce, Muskmelon, Cantaloupe, Onion, Pepper, Pumpkin, Squash, Tomato, Columbine, Zinnia, etc.

Shipping Carlots—Alfalfa, Red and Sweet Clover, Heavy Mountain Seed Oats, Barley, Beans, etc.

THE GRAND JUNCTION SEED CO., Grand Junction, Colorado

COMSTOCK, FERRE & CO.

Wethersfield, Conn.

GARDEN SEED
PEAS AND BEANS
ONION SEED

FLOWER SEED
SWEET CORN
ONION SETS

Connecticut grown Tobacco Seed
Havana and Connecticut Seed Leaf

GROWERS, WHOLESALE DEALERS

ESTABLISHED 1820

INCORPORATED 1853

McGill's Pure Bred
SEEDS

BEET
BEANS
CARROT
CELERY

ONION

LETTUCE
RADISH
PEAS

IN VARIETY

The R. C. MCGILL SEED CO.

WHOLESALE SEED GROWERS

San Francisco

"We have been improving Seeds since 1912"



SEED BEANS

Garden Varieties

SUPERIOR TYPES
HIGH QUALITY
ROGUED STOCKS

HENRY BERRIEN FISH

Wholesale Grower

CARPINTERIA, CALIFORNIA

WHOLESALE GARDEN SEEDS—Continued

IDAHO

Darrow Bros. Seed & Supply Co.
Twin Falls, Idaho

ILLINOIS

Barnard Co., The W. W.
Chicago, Ill.
(See Adv. Index Page 178)

Hollenbach, Peter (Onion Sets)
Chicago, Ill.
(See Adv. Index Page 178)

Leonard Seed Co.
Chicago, Ill.
(See Adv. Index Page 178)

Quality Seed & Bulb Co.
Chicago, Ill.

Rogers Bros. Seed Co.
Chicago, Ill.
(See Adv. Index Page 178)

Vaughan's Seed Store
Chicago, Ill.

Condon Bros.
Rockford, Ill.
(See Adv. Index Page 178)

Rockford Seed Co.
Rockford, Ill.

INDIANA

Crabbs, Reynolds, Taylor Co.
Crawfordsville, Ind.

Ohio Valley Seed Co.
Evansville, Ind.

Williamson, E. B.
Goshen, Ind.

Warren Seed Co.
Indianapolis, Ind.

IOWA

Iowa Seed Co.
Des Moines, Iowa

Sioux City Seed Co.
Sioux City, Iowa
(See Adv. Index Page 178)

KANSAS

Mangelsdorf Seed Co.
Atchison, Kan.

Barteldes Seed Co.
Lawrence, Kan.

Coe Seed & Grain Co., D. O.
Topeka, Kan.
(See Adv. Index Page 178)

Ross Bros. Seed Co.
Wichita, Kan.

KENTUCKY

Brent Seed Co., C. S.
Lexington, Ky.

Hall Seed Co.
Louisville, Ky.
(See Adv. Index Page 178)

Wood, Stubbs & Co.
Louisville, Ky.

LOUISIANA

Reuter Seed Co.
New Orleans, La.

Steckler Seed Co., Inc., J.
New Orleans, La.

MARYLAND

Blamberg Brothers, Inc.
Baltimore, Md.
(See Adv. Index Page 178)

Bolgiano Seed Co., J.
Baltimore, Md.

Griffith & Turner Co.
Baltimore, Md.

Manns & Co., J.
Baltimore, Md.

MASSACHUSETTS

Breck & Sons, Joseph
Boston, Mass.

Emerson Co., Thos. W.
Boston, Mass.

Ferry Seed Co.
Boston, Mass.

Grey Co., Thos. J.
Boston, Mass.

Ross Bros. Co.
Worcester, Mass.

MICHIGAN

American Seed Co.
Detroit, Mich.

Detroit International Sales Co.
Detroit, Mich.

Ferry & Co., D. M.
Detroit, Mich.

Brown Seed Co., Alfred J.
Grand Rapids, Mich.
(See Adv. Index Page 178)

Brown & Son, Inc., A. J. (Peas and Beans)
Grand Rapids, Mich.

Isbell Seed Co.
Jackson, Mich.
(See Adv. Index Page 178)

MINNESOTA

Farmer Seed & Nursery Co.
Faribault, Minn.
(See Adv. Index Page 178)

Minnetonka Gladiolus Farms
R. 3, Hopkins, Minn.

Northrup, King & Co.
Minneapolis, Minn.
(See Adv. Index Page 178)

MISSISSIPPI

Rose Seed Co.
Clarksdale, Miss.

Taylor-Tucker Seed Co.
Jackson, Miss.

Kimbrough Seed Co.
Meridian, Miss.

MISSOURI

Rudy-Patrick Seed Co.
Kansas City, Mo.
(See Adv. Index Page 178)

Chesmore Seed Co.
St. Joseph, Mo.

Corneli Seed Co.
St. Louis, Mo.
(See Adv. Index Page 178)

Kaercher Seed & Supply Co.
St. Louis, Mo.

United States Seed Co.
St. Louis, Mo.

MONTANA

Barkemeyer Grain & Seed Co.
Great Falls, Mont.

State Nursery & Seed Co.
Helena, Mont.

NEBRASKA

Western Seed & Irrigation Co.
Fremont, Neb.
(See Adv. Index Page 178)

Griswold Seed & Nursery Co.
Lincoln, Neb.
(See Adv. Index Page 178)

Gunn Seed Co.
Lincoln, Neb.

Nebraska Seed Co.
Omaha, Neb.

Ranney Seed Co., C. A.
Omaha, Neb.

Stewart Seed Co.
Omaha, Nebr.



Michigan Grown SEEDS

CONTRACT GROWERS OF

BEANS
SWEET CORN
CUCUMBER
RADISH

TOMATO
MUSKMELON
WATERMELON
SQUASH

Quality Stocks

ISBELL SEED COMPANY

JACKSON, MICHIGAN

MEMBERS: A. S. T. A.—SOUTHERN S. A.—WESTERN S. A.

WHOLESALE

Growers of

BEANS—PEAS
SWEET CORN
RADISH—ONION

and

All Garden Seeds

for

Merchant Trade

Write us when in need.

CONDON BROS.

Seedsman

Rock River Valley Seed
Farm

ROCKFORD ILLINOIS

BARNARD'S Vegetable Flower and Lawn Seeds

Beans Peas Onion Sets

*For Prompt Shipments
or Growing Contracts*

Samples and Quotations
Gladly Furnished

The
W. W. Barnard Co.
Seed Merchants
3942 S. Federal St., Chicago

WHOLESALE GARDEN SEEDS—Continued

NEW JERSEY

- Riverview Farms (Asparagus)
 Bridgeton, N. J.
Shedaker & Son, B. D.
 Burlington, N. J.
 (See Adv. Index Page 178)
 Taylor Bros.
 Camden, N. J.
Pedrick & Son, Geo. R.
 Pedricktown, N. J.
 (See Adv. Index Page 178)
Hurff, Edgar F.
 Swedesboro, N. J.
 (See Adv. Index Page 178)

NEW HAMPSHIRE

- Holbrook Grocery Co.
 Keene, N. H.

NEW YORK

- Danish Seed Growers Sales Co., Inc.**
 Brooklyn, N. Y.
 (See Adv. Index Page 178)
Harvey Seed Co.
 Buffalo, N. Y.
 (See Adv. Index Page 178)
Rice Seed Co., Jerome B.
 Cambridge, N. Y.
 (See Adv. Index Page 178)
Forrest Seed Co., Inc.
 Cortland, N. Y.
 (See Adv. Index Page 178)
 Burt, William D.
 Dalton, N. Y.
 Denison Seed Co., W. A.
 Ellisburg, N. Y.
Page Seed Co.
 Greene, N. Y.
 (See Adv. Index Page 178)
Lupton & Son, J. M.
 Mattituck, L. I., N. Y.
 (See Front Cover)
 Mastin, Cornelius H.
 Newburgh, N. Y.
Amtorg Trading Corporation
 New York, N. Y.
 (See Adv. Index Page 178)
Henry & Lee
 New York, N. Y.
Herbst Bros.
 New York, N. Y.
 (See Adv. Index Page 178)
 Holst-Knudsen, S.
 New York, N. Y.
Loechner & Co., Inc.
 New York, N. Y.
 (See Adv. Index Page 178)
 Madsen & Co., Thos.
 New York, N. Y.
 Steinhardt & Nordlinger
 New York, N. Y.
Stumpp & Walter Co.
 New York, N. Y.
 (See Adv. Index Page 178)
 Vaughan's Seed Store
 New York, N. Y.
 Williamson, Garfield
 New York City
 Vick's Sons, James
 Rochester, N. Y.
 Metcalf & Son, Inc., B. F.
 Syracuse, N. Y.
 Saul, C. F.
 Syracuse, N. Y.
- NORTH CAROLINA**
 Asheville Seed Co.
 Asheville, N. C.
 Buxton White Seed Co.
 Elizabeth City, N. C.
 Huske Hdwe. Co.
 Fayetteville, N. C.
 Wyatt & Sons Co., Job P.
 Raleigh, N. C.
 Roudabush & Co., W. P.
 Wilmington, N. C.

NORTH DAKOTA

- Will & Co., Oscar H.
 Bismarck, N. D.
Magill & Co. (Operating Fargo Seed House)
 Fargo, N. D.
 (See Adv. Index Page 178)

OHIO

- Botzum Seed Co.
 Akron, Ohio
 Miller, Seedsman, Wm.
 Bellefontaine, Ohio
 Holmes Seed Co.
 Canton, Ohio
 Holmes-Letherman Seed Co.
 Canton, Ohio
 Schilder Bros. (Onion Seed and Sets)
 Chillicothe, Ohio
 McCullough Seed Co., J. Chas.
 Cincinnati, Ohio
McCullough's Sons Co., J. M.
 Cincinnati, Ohio
 (See Adv. Index Page 178)
Market Gardener's Seed Co.
 Cincinnati, Ohio
 (See Adv. Index Page 178)
 Botzum Seed Co.
 Cleveland, Ohio
 Johnson's Seed Store
 Cleveland, Ohio
 Davis, Zack
 Delaware, Ohio

OKLAHOMA

- Muskogee Seed House
 Muskogee, Okla.
 Binding-Stevens Seed Co.
 Tulsa, Okla.

OREGON

- Gili Bros. Seed Co.
 Portland, Ore.
Lilly Co., The Chas. H.
 Portland, Ore.
 (See Adv. Index Page 178)
 Portland Seed Co.
 Portland, Ore.
 Routledge Seed & Floral Co.
 Portland, Ore.

PENNSYLVANIA

- Landreth Seed Co., D.**
 Bristol, Pa.
 (See Adv. Index Page 178)
Schell, Inc., Walter S.
 Harrisburg, Pa.
 (See Adv. Index Page 178)
Buist Co., Robert
 Philadelphia, Pa.
 (See Adv. Index Page 178)
Burpee Co., W. Atlee
 Philadelphia, Pa.
 (See Adv. Index Page 178)
Simon & Son, I. N.
 Philadelphia, Pa.
 (See Adv. Index Page 178)
 Scott Co., I. W.
 Pittsburgh, Pa.
 Hertzog, H. F.
 Reading, Pa.

SOUTH CAROLINA

- Mixon Seed Co., W. H.
 Charleston, S. C.
 Kirkland Seed Co., B. B.
 Columbia, S. C.

SOUTH DAKOTA

- Gurney Seed & Nursery Co.
 Yankton, S. D.

TENNESSEE

- Block Seed Co.
 Chattanooga, Tenn.
 Mayo, D. R.
 Knoxville, Tenn.



SEED GROWERS
BEANS, CORN, BEET
RADISH, PEPPER
TOMATO, VINE
SEEDS

SPECIALTY:
BEST OF THE NEW
ENGLISH PEAS
CAR LOTS OR LESS

Export Accounts Solicited

Descriptive Wholesale Cata-
logue on Request

Quality our First Consideration

JEROME B. RICE SEED CO.

CAMBRIDGE, NEW YORK, U. S. A.

We sell
FIELD AND GARDEN SEEDS

(Ask for quotations and samples)

We buy
FIELD AND GARDEN SEEDS

(Send quotations and samples.)

THE MARKET GARDENER'S SEED CO.

120-122-124-126 East Court Street

CINCINNATI, OHIO

GEORGE B. EDGERTON

ESTABLISHED 1858

HARVEY SEED COMPANY

Successors to Harvey Brothers

Field and Garden Seed, Poultry Supplies
and Grain

Warehouse 105, 107, 109, 111, 113 Chicago Street

Office and Store
65-69 Ellicott Street

Buffalo, N. Y.

WHOLESALE GARDEN SEEDS—Continued

Snapp & Sons, J. P.
Limestone, Tenn.
Buchanan Seed Company, R. B.
Memphis, Tenn.
Craig & Co., R. G.
Memphis, Tenn.
Mosby Seed Co., John
Memphis, Tenn.
Russell-Heckle Seed Co.
Memphis, Tenn.
Schwill & Co., Otto
Memphis, Tenn.
Hill & Co., Chas. A.
Nashville, Tenn.
Rose & Co., G. P.
Nashville, Tenn.
Collins Company, The
Winchester, Tenn.

TEXAS

Sullivan, J. G. (Onion Seed)
Asherton, Texas
(See Adv. Index Page 178)
Nicholson Seed Co., Robert
Dallas, Texas
Wise Seed Co., W. D.
El Paso, Texas
American Seed Co.
Fort Worth, Texas
Sherman Magnolia Seed Co.
Dallas, Texas.

UTAH

Carpenter Seed Co.
Provo, Utah
Bailey & Sons Co.
Salt Lake City, Utah
Filer Seed Co.
Salt Lake City, Utah
Porter-Walton Seed Co.
Salt Lake City, Utah

VIRGINIA
Wetzel Seed Co.
Harrisonburg, Va.
Tait & Sons, Geo.
Norfolk, Va.
Warren & Co., D. W.
Norfolk, Va.
Williams Seed Co.
Norfolk, Va.
Fairfax Seed Co.
Oakton, Va.
Diggs & Beadles
Richmond, Va.
Wood & Sons, T. W.
Richmond, Va.
Slate Seed Co. (Tobacco)
South Boston, Va.

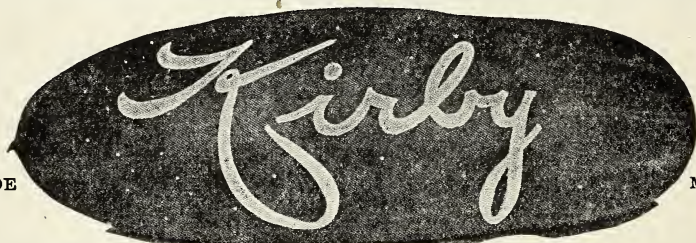
WASHINGTON

Christianson & Co., Alf
Mt. Vernon, Wash.
Lilly Co., Chas. H.
Seattle, Wash.
(See Adv. Index Page 178)
Inland Seed Co.
Spokane, Wash.
Spokane Seed Co.
Spokane, Wash.

WISCONSIN

Knauf & Tesch Co.
Chilton, Wis.
Salzer Seed Co., J. A.
La Crosse, Wis.
Manitowoc Seed Co.
Manitowoc, Wis.
Wisconsin Cabbage Seed Co. (Cabbage
Seed)
Racine, Wis.

TRADE



MARK

(Registered U. S. Patent Office)

CUCUMBER

Beware of Imitation — Protect yourself and your customers
USE ORIGINATORS STOCK

It Stays Green

Kirby Cucumber Seed since its introduction by the originator, Norval E. Kirby, has become the most popular of all. This cucumber has every quality that could be desired. Earliness, Productiveness, Perfect Shape, Perfect Shipper and that beautiful Dark Green color from stem to blossom end which attracts critical buyers.

Sold only in Sealed, Illustrated Containers and to be re-sold in Original Containers. Put up in popular sizes, Packets, Ounces, ¼ Pounds, ½ Pounds and Pounds. If you desire to offer this most valuable Cucumber Seed in your new Catalog, place your order with us NOW. Prices on application. Wholesale Catalog on request.

I. N. SIMON & SON, 438 Market St., Dept. 5, Philadelphia, Pa.
NORVAL E. KIRBY WESLEY D. SIMON

J. C. ROBINSON SEED CO.

WATERLOO, NEBR.

ROCKY FORD, COL.

Growers of

SEED CORN

SWEET, DENT, FLINT, POP

VINE SEEDCUCUMBER, MUSKMELON, WATERMELON,
SQUASH and PUMPKIN*Growers for Wholesale Trade Only*

Our 1929 plantings have been carefully chosen and our crops are unusually fine and we have some wonderfully fine offerings for immediate booking.

PIETERS-WHEELER SEED CO.

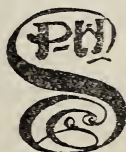
GILROY, CALIFORNIA

WHOLESALE GROWERS

SELECT STOCKS

BEET
CARROT
CELERY
LETTUCE
ONION

THE MARK



OF QUALITY

PARSLEY
PARSNIP
RADISH
SALSIFY
SWEET PEAS

GROWERS GARDEN SEEDS

ALABAMA

Pharr, King
Catherine, Ala.

CALIFORNIA

Fish, Henry Berrien (Beans)
Carpinteria, Cal.
(See Adv. Index Page 178)

Golden State Seed Co.
Coyote, Cal.

Pieters-Wheeler Seed Co.
Gilroy, Cal.
(See Adv. Index Page 178)

Rohnert, Waldo
Gilroy, Cal.
(See Adv. Index Page 178)

Richard Diener Co., Inc.
Kentfield, Cal.

Aggeler & Musser Seed Co., Inc.
Los Angeles, Cal.
(See Adv. Index Page 178)

Bodger & Sons Co., John
El Monte, Los Angeles County, Calif.
(See Adv. Index Page 178)

Germain Seed & Plant Co.
Los Angeles, Cal.
(See Adv. Index Page 178)

Morris & Snow Seed Co.
Los Angeles, Cal.

Fosgate & Lion Seed Co.
Mountain View, Cal.

Ellery, H. E.
Oceanside, Calif.

Lagomarsino & Sons, F.
Sacramento, Cal.
(See Adv. Index Page 178)

Laughlin Seed Co. (Onion)
Sacramento, Cal.

Ward Seed Co., Wm. A.
Sacramento, Cal.
(See Adv. Index Page 178)

Bertrand Seed Co.
San Francisco, Calif.
(See Adv. Index Page 178)

McGill Seed Co., R. C.
San Francisco, Cal.
(See Adv. Index Page 178)

Morse & Co., C. C.
San Francisco, Cal.
(See Adv. Index Page 178)

Pacific Seed Growers
San Francisco, Calif.

Sherwood Seed Co.
San Francisco, Cal.

Braslan Seed Growers Co., Inc.
San Jose, Cal.
(See Adv. Index Page 178)

California Seed Growers Assn., Inc.
San Jose, Calif.

Kimberlin Seed Co.
San Jose, Cal.

Johansen-Winslow Seed Co.
San Luis Obispo, Cal.

Haven Seed Co. (Tomato)
Santa Ana, Cal.
(See Adv. Index Page 178)

Henry Fish Seed Co. (Beans)
Santa Barbara, Calif.
(See Adv. Index Page 178)

Martin, Harry
Stockton, Cal.

Standard Seed Farms Co.
Stockton, Cal.
(See Adv. Index Page 178)

Hogue-Kellogg Co.
Ventura, Cal.
(See Adv. Index Page 178)

CANADA

Hogg & Lytle, Ltd.
Toronto, Ont., Canada

Hume & Sons, John
Port Hope, Ont., Canada

Morrow Seed Co. (Peas and Beans)
Toronto, Ont., Canada
(See Adv. Index Page 178)

Steele, Briggs Seed Co., Ltd.
Toronto, Canada.
(See Adv. Index Page 178)

COLORADO

Franklin, A. L. (Onions)
Delta, Colo.

Barteldes Seed Co. (Beans)
Denver, Colo.

Grand Junction Seed Co.
Grand Junction, Colo.
(See Adv. Index Page 178)

Balcom Seed Co. (Beans)
Greeley, Colo.

La Junta Trading Co., The
La Junta, Colo.

Wiesel Seed Co. (Beans and Vine Seeds)
Pueblo, Colo.

Blotz-Henneman Seed Co.
Rocky Ford, Colo.

Burrell, D. V.
Rocky Ford, Colo.

Ebbert Seed Co.
Rocky Ford, Colo.

Garwood & Woodside (Cantaloupe)
Rocky Ford, Colo.

James, R. H.
Rocky Ford, Colo.

Palmer Seed Co.
Rocky Ford, Colo.

Ryan Bros.
Rocky Ford, Colo.

Robinson Seed Co., The J. C.
Rocky Ford, Colo.
(See Adv. Index Page 178)

Gauger, J. E.
Swink, Colo.

CONNECTICUT

Woodruff & Sons, F. H.
Milford, Conn.

Associated Seed Growers, Inc.
New Haven, Conn.

Woodruff & Sons, S. D.
Orange, Conn.
(See Adv. Index Page 178)

Comstock, Ferre & Co.
Wethersfield, Conn.
(See Adv. Index Page 178)

Hart Seed Co., Chas. C.
Wethersfield, Conn.
(See Adv. Index Page 178)

DELAWARE

Boggs & Sons, Caleb
Cheswold, Del.

FLORIDA

Coxetter, S. V. (Melon)
Lloyd, Fla.

Taylor Seedsman, Inc., H. M. (Watermelon)
Lloyd, Fla.
(See Adv. Index Page 178)

Willie & Son, J. J. (Watermelon)
Lloyd, Fla.

Evans Seed Co.
Monticello, Fla.

Gilbert, D. H. (Watermelon)
Monticello, Fla.

Morris, W. M. (Watermelon)
Monticello, Fla.

Sattler, F. J. (Watermelon)
Monticello, Fla.

THE CHAS. C. HART SEED COMPANY

**GARDEN SEED
SWEET CORN
ONION SETS
BEANS
PEAS**

CHOICE STOCKS

WRITE OR WIRE FOR QUOTATIONS
ON YOUR SEED REQUIREMENTS
WE KNOW WE CAN PLEASE YOU
IN BOTH QUALITY AND PRICE

**THE CHAS. C. HART
SEED COMPANY**
WETHERSFIELD, CONN.

SANTA BARBARA SEED BEANS

Grown by

HENRY FISH SEED CO.

(Established 1875)

SANTA BARBARA, CALIF.

for the

**Wholesale Seed Trade
Exclusively**

MEMBERS

American Seed Trade Assn.
Pacific States Seedsmen's Assn.
Associate Member
Southern Seedsmen's Assn.

WHOLESALE GROWERS

Lettuce	Parsnip	Endive
Carrot	Onion	Mustard
Celery	Salsify	Radish
Beet	Sweet Peas	

GROWERS OF PRIVATE STOCKS
QUOTATIONS ON REQUEST

Braslan Seed Growers Company, Inc.
San Jose, California
Cable address: Braslan



Est. 1898

Inc. 1925

For Perfect Satisfaction
in

W-A-T-E-R-M-E-L-O-N S-E-E-D

Send Your Contracts
to

H. M. TAYLOR SEEDSMAN, INC.

Lloyd

::

Florida

GROWERS GARDEN SEEDS—Continued

GEORGIA

Branch, M. I. (Watermelon)
Berzella, Ga.
Arrington Co., H. H. (Okra)
Rome, Ga.

IDAHO

Cornell Seed Ranch
Middleton, Idaho
Crookham & Co.
Caldwell, Idaho
Hodge, G. D. (N. Y. Head Lettuce Seed)
Moscow, Idaho
Washburn-Wilson Seed Co.
(Peas and Beans)
Moscow, Idaho
(See Adv. Index Page 178)
Idaho Equity Exchange (Lettuce)
Nampa, Idaho

ILLINOIS

Barnard Co., W. W.
Chicago, Ill.
(See Adv. Index Page 178)
Leonard Seed Co.
Chicago, Ill.
(See Adv. Index Page 178)
Rogers Bros. Seed Co. (Peas and Beans)
Chicago, Ill.
(See Adv. Index Page 178)
Vaughan's Seed Store
Chicago, Ill.
Condon Bros.
Rockford, Ill.
(See Adv. Index Page 178)

INDIANA

Crabbs Reynolds Taylor Co.
Crawfordsville, Ind.

IOWA

Hoopes & Co., J. E.
Muscatine, Iowa
Sioux City Seed Co.
Sioux City, Iowa

KANSAS

Burg, A. H. (Vine Seeds)
Lakin, Kan.
Barteldes Seed Co.
Lawrence, Kan.

MARYLAND

Blamberg Bros.
Baltimore, Md.
(See Adv. Index Page 178)

MASSACHUSETTS

Breck & Sons, Joseph
Boston, Mass.
Emerson Co., Thos. W.
Boston, Mass.

MICHIGAN

Adrian Seed Growing Co.
Adrian, Mich.
Hall-Stingle Co. (Tomato)
Adrian, Mich.
Lenawee Seed Co.
Blissfield, Mich.
Gebruder Dippe, A. G.
Detroit, Mich.
Ferry & Co., D. M.
Detroit, Mich.
Brown & Son, Inc., A. J. (Peas and Beans)
Grand Rapids, Mich.
Brown Seed Co., Alfred J. (Peas and Beans)
Grand Rapids, Mich.
(See Adv. Index Page 178)
Isbell Seed Co.
Jackson, Mich.
(See Adv. Index Page 178)

MINNESOTA

Northrup, King & Co.
Minneapolis, Minn.
(See Adv. Index Page 178)

MISSOURI

Corneli Seed Co.
St. Louis, Mo.
(See Adv. Index Page 178)
United States Seed Co.
St. Louis, Mo.

MONTANA

Gallatin Valley Seed Co.
Bozeman, Mont.
Western Seed Co., The
Hamilton, Mont.

NEBRASKA

Western Seed & Irrigation Co. (Vine Seed, Corn)
Fremont, Neb.
(See Adv. Index Page 178)
Coy Seed Co., Inc., The C. Herbert Valley, Neb.
(See Adv. Index Page 178)
Coy & Son, Chauncey P. (Vine)
Waterloo, Neb.
Robinson Seed Co., J. C. (Vine and Corn)
Waterloo, Neb.
(See Adv. Index Page 178)

NEW JERSEY

Riverview Farms
Bridgeton, N. J.
Shedaker & Son, B. D.
Burlington, N. J.
Hammell Seed Farms, Geo. Q.
Delanco, N. J.
Pedrick & Son, Geo. R.
Pedricktown, N. J.
(See Adv. Index Page 178)
Hurff, Edgar F.
Swedesboro, N. J.
(See Adv. Index Page 178)
True Type Seed Co.
Woodstown, N. J.

NEW YORK

Rice Seed Co., Jerome B.
Cambridge, N. Y.
(See Adv. Index Page 178)
Allen, Linnaeus
Cutchogue, Long Island, N. Y.
Lupton & Son, J. M.
Mattituck, L. I., N. Y.
(See Front Cover)
Herbst Brothers
New York, N. Y.
(See Adv. Index Page 178)
Madsen & Co., Thos.
New York, N. Y.
Stumpp & Walter Co.
New York, N. Y.
(See Adv. Index Page 178)
Suhr, E.
New York, N. Y.
(See Adv. Index Page 178)
Woodruff & Sons, S. D.
New York, N. Y.
(See Adv. Index Page 178)

NORTH DAKOTA

Will & Co., Oscar H.
Bismarck, N. D.

OHIO

Holmes Seed Co.
Canton, Ohio
Schilder Bros. (Onion Seed and Sets)
Chillicothe, Ohio
Quirk, John B.
North Madison, Ohio
Limeshale Seed Co.
Waldo, Ohio

BUY
SULLIVAN'S

Teneriffe, Canary Island, Grown

**Bermuda
Onion Seed**

YELLOW BERMUDA and CRYSTAL WAX

BEST ON EARTH

Dependable Quality and Dependable Supply
Largest Grower of Onion Seed in Teneriffe

Write or wire for 1928 contract prices.

I can grow any quantity of either crystal Wax or Yellow Bermuda Onion Seed for you in Teneriffe if you will place your order with me early. Why take chances on poor quality and short delivery when you can have an Onion seed specialist grow your seed for you.

J. G. SULLIVAN

Largest Importer and Distributor of Bermuda Onion
Seed in the United States

ASHERTON, TEX.

BODGER'S SEED DEMAND

Necessitates This Tremendous

ACREAGE

*Sold the World Over to Discriminating
Seed Distributors*



We grow a full line of High-Grade Flower Seeds and Bulbs and are world renowned specialists in Asters and Zinnias

Asters, 150 acres

Zinnias, 150 acres

Narcissus, 200 acres

Sweet Peas, 200 acres

Other Flower Seeds, 600 acres

The Industry's

Tribute to

QUALITY

JOHN BODGER & SEED

EL MONTE

LOS ANGELES

"BODGER'S"

*"The Buy-Word of Discriminating
Seedsmen"*

We value the Medals and Awards of Merit won by our Flowers at European Horticultural Exhibits, but place a higher value on the universal preference being manifested throughout the world by seedsmen who know and appreciate superior types and strains.



Our method of rogueing and hand-picking enables us to maintain our reputation as Growers of the BEST.

In our thirty years of Flower Seed Growing we have made an intensive study, not only of types and colors, but of the climatic and soil conditions in which each variety of Flower Seed may be produced to the best advantage.

California sunshine, ideal soil conditions and our extensive experience, have crowned our efforts with success.

SONS COMPANY

GROWERS

COUNTY

CALIFORNIA

"BLOOD TELLS"

The growing of seeds as much or perhaps more so than in most any other business must be founded on confidence.

Confidence in the men with whom you deal—their knowledge, their experience and their method of doing business.

GOOD WILL
THROUGH
CONFIDENCE
IN



THE "GROWER"
THE "SEED"
THE "SERVICE"

The basis of good seed stock is the breeding grounds. The above scene was taken on our Idaho Ranch during an inspection by Mr. Rogers last summer of our Pea Trial Grounds.

Mr. Rogers devotes his entire time and a wealth of knowledge acquired through more than 50 years' experience in seed breeding to this vitally important step in the production of better seeds.

ROGERS BROS. SEED COMPANY

Breeders and Growers for the Wholesale Seed Trade

CHICAGO

ILLINOIS

GROWERS GARDEN SEEDS—Continued

OREGON

Aabling's Seed Farms, Inc.
Portland, Ore.
Portland Seed Co.
Portland, Ore.

PENNSYLVANIA

Landreth Seed Co., D.
Bristol, Pa.
(See Adv. Index Page 178)
Garrahan, C. E. (Celery)
Kingston, Pa.
Burpee Co., W. Atlee
Philadelphia, Pa.
(See Adv. Index Page 178)
Simon & Son, I. N.
Philadelphia, Pa.

SOUTH CAROLINA

Carolina Seed & Plant Co.
Florence, S. C.

SOUTH DAKOTA

Gurney Seed & Nursery Co.
Yankton, S. D.

TEXAS

Sullivan, J. G. (Onion Seed)
Asherton, Texas
(See Adv. Index Page 178)
Sherman Magnolia Seed Co.
Dallas, Texas
American Seed Co.
Fort Worth, Texas

UTAH

Filer Seed Co. (Beans and Peas)
Salt Lake City, Utah

VERMONT

Hawkins, Budd D.
Reading, Vt.

VIRGINIA

Wood & Sons, T. W.
Richmond, Va.
Slate Seed Co.
So. Boston, Va.

WASHINGTON

Tillinghast Seed Co., The
La Conner, Wash.
Aabling's Seed Farms, Inc.
Mount Vernon, Wash.
Christianson & Co., Alf
Mt. Vernon, Wash.
Lilly Co., Chas. H.
Seattle, Wash.
(See Adv. Index Page 178)
Northwest Seed Co.
Seattle, Wash.
Inland Seed Co.
Spokane, Wash.
Morrison Seed Co.
Spokane, Wash.

WISCONSIN

Knauf & Tesch Co. (Peas)
Chilton, Wis.
Rugowski, Seed Co., J. K.
Manitowoc, Wis.
Hansche Bros.
Racine, Wis.
Wisconsin Cabbage Seed Co. (Cabbage Seed)
Racine, Wis.
(See Adv. Index Page 178)
Piper Produce Co.
Racine, Wis.
Rasmussen, N. A.
Sommers, Wis.

GROWERS FLOWER SEEDS

CALIFORNIA

Golden State Seed Co.
Coyote, Cal.
Rohnert, Waldo (Sweet Peas)
Gilroy, Cal.
(See Adv. Index Page 178)
Waller-Franklin Seed Co.
Guadalupe, Cal.
(See Adv. Index Page 178)
Diener Co., Inc., Richard
Kentfield Cal.
Zvolanek, Ant. C. (Sweet Peas)
Lompoc, Cal.
Aggeler & Musser Seed Co.
Los Angeles, Calif.
(See Adv. Index Page 178)
Bodger & Sons Co., John (Asters, Zinnias)
El Monte, Los Angeles County, Calif.
(See Adv. Index Page 178)
Germain Seed & Plant Co.
Los Angeles, Cal.
(See Adv. Index Page 178)
Fosgate & Lion Seed Co.
Mountain View, Calif.
Morse & Co., C. C. (Sweet Peas)
San Francisco, Cal.
(See Adv. Index Page 178)
Schoorl, Adrian J.
San Francisco, Cal.
Braslan Seed Growers Co., Inc.
San Jose, Cal.
(See Adv. Index Page 178)
Johansen Winslow Seed Co.
San Luis Obispo, Cal.
MacDonald Seed Co., The Wm.
Santa Maria, Calif.
(See Adv. Index Page 178)

Hogue-Kellogg Co., The
Ventura, Cal.
(See Adv. Index Page 178)

CANADA

Steele, Briggs Seed Co., Ltd.
Toronto, Canada
(See Adv. Index Page 178)
Sunset Seed Co., Ltd.
Victoria, B. C., Canada

COLORADO

Colorado Seed Co. (Evergreen Tree Seed and Columbines)
Denver, Colo.
Grand Junction Seed Co. (Zinnias)
Grand Junction, Colo.
(See Adv. Index Page 178)
Burrell, D. V.
Rocky Ford, Colo.

FLORIDA

Zangen, O. V.
Davenport, Fla.

IDAHO

Woodacres, Fred B. Wood
Boise, Idaho

ILLINOIS

American Bulb Company
Chicago, Ill.
(See Adv. Index Page 178)
Barnard Co., W. W.
Chicago, Ill.
(See Adv. Index Page 178)
Vaughan's Seed Store
Chicago, Ill.

GROWERS FLOWER SEEDS—Continued

MICHIGAN

Gebruder Dippe, A. G.
Detroit, Mich.

MINNESOTA

Minnetonka Gladiolus Farms
R. 3, Hopkins, Minn

MISSOURI

Ayres Seed Co., S. Bryson
Kansas City, Mo.

NEW JERSEY

Forbes & Co., Alex
Newark, N. J.

NEW YORK

Cowee, Arthur
Berlin, N. Y.
John Lewis Childs Seed Co.
Floral Park, L. I., N. Y.
Page Seed Co.
Greene, N. Y.
(See Adv. Index Page 178)

Herbst Bros.

New York, N. Y.
(See Adv. Index Page 178)

Lochner & Co., Inc.

New York, N. Y.
(See Adv. Index Page 178)

Stumpp & Walter Co.

New York, N. Y.
(See Adv. Index Page 178)

Vaughan's Seed Store

New York, N. Y.

Vick's Sons, James
Rochester, N. Y.

NORTH DAKOTA

Will & Co., Oscar H.
Bismarck, N. D.

OHIO

McCullough Seed Co., The J. Chas.
Cincinnati, Ohio

OREGON

Ellis, Mrs. Merton G. (Pansy)
Canby, Ore.
(See Adv. Index Page 178)
Steele's Pansy Gardens (Pansy)
Portland, Ore.

PENNSYLVANIA

Landreth Seed Co., D.
Bristol, Pa.
(See Adv. Index Page 178)
Burpee Co., W. Atlee
Philadelphia, Pa.
(See Adv. Index Page 178)

SOUTH DAKOTA

Gurney Seed & Nursery Co.
Yankton, S. D.

TENNESSEE

Snapp & Sons, J. P.
Limestone, Tenn.

TEXAS

Nicholson Seed Co., Robt.
Dallas, Texas

VERMONT

Hawkins, Budd D.
Reading, Vt.

WISCONSIN

Toole, W. A.
Baraboo, Wis.
Rugowski Seed Co., J. K.
Manitowoc, Wis.

FOREIGN GARDEN SEEDS

AUSTRALIA

Anderson & Co., Ltd., Seedsmen
Sydney, N. S. W., Australia
Anderson & Co., W. H.
Sydney, Australia
Brunnings, Pty., Ltd., F. H.
Melbourne, Australia
Law, Somner & Co.
Melbourne, Australia
Peterson Bros. & Craig, Ltd.
Brisbane, Queensland, Australia
Railton & Co.
Melbourne, Australia
Shepherd & Sons, Ltd.
Sydney, Australia
Yates & Co., Arthur
184 Sussex St.
Sydney, N. S. W., Australia

CANARY ISLANDS

Alonso, Juan P.
Teneriffe, Canary Islands
Dorta, C. Garcia (Onion Seed)
Teneriffe, Canary Islands
Varela, Frederico C.
Teneriffe, Canary Islands

CZECHOSLOVAKIA

Bahlsen, Arnost,
Prague, Czechoslovakia
Grunberger, A. M.
Trebic, Czechoslovakia
Loewenthal Brothers
Brno, Czechoslovakia
Schon, Jacob S., Ltd.
Brünn, Czechoslovakia
Vanek, Heinrich
Prague, Czechoslovakia

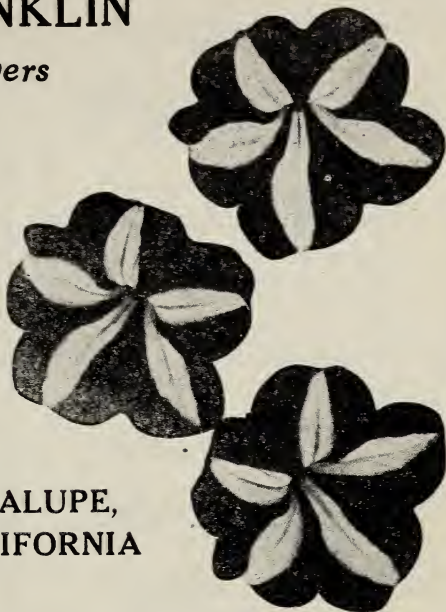
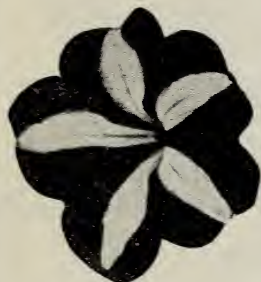
DENMARK

L. Daehnfeldt & Theodor Jensen, Ltd.
Odense, Denmark
Danlisen, E., & Larsen, A. S.
Nakskov, Denmark
Dansk Frokultur
Kerteminde, Denmark
Dreyer Fr.
Aarhus, Denmark
Froavl Ostergaard
Horsens, Denmark
Frocontorst
Kolding, Denmark
Frokompagniet, A. S.
Maribo, Denmark
Hansen, A. (Cauliflower and Cabbage)
Kastrup, Amager, Denmark
(See Adv. Index Page 178)
Hartmann & Co., Hjalmar
Copenhagen, Denmark
Helm-Petersen Co., J. C.
Aarhus, Denmark
Hoffding, N. F.
Copenhagen, Denmark
Krogh, A.
Odense, Denmark
Madsen & Co., Thos.
Slagelse, Denmark
Nissen, Fr.
Copenhagen, Denmark
Ohlsen's Enke, J. E.
Linnegade 14, Copenhagen, Denmark
(See Adv. Index Page 178)
Olsen, Chr. (Cauliflower, Cabbage)
Odense, Denmark
Ostergaards Froval
Stensballe, Horsens, Denmark
Scandinavian Seed Co.
Copenhagen, Denmark

WALLER-FRANKLIN

Wholesale Growers

**ANNUAL
AND
PERENNIAL
FLOWER
SEEDS**



**GUADALUPE,
CALIFORNIA**



OREGON GIANT PANSY SEED

Finest Giant Ruffled Pansies

If you are growing Pansies
to sell, or
If you want Better Pansies
than your neighbors,
Write for Prices. } **YOU CAN'T
DO
WITHOUT
THE
OREGON
GIANTS**

This strain originated and grown by

MRS. MERTON G. ELLIS
Canby, Oregon

EXCLUSIVE FLOWER SEED GROWERS

Specializing in

FLORISTS STRAINS

Also a General List of
Flower Seeds

Contract Prices for 1929 Mailed
on Application

**THE
WM. MACDONALD
SEED CO.**

Santa Maria California

FOREIGN GARDEN SEEDS—Continued

Stallknecht & Meyer
Copenhagen, Denmark

Suhr, E.
Copenhagen, Denmark
(See Adv. Index Page 178)

CHINA

Manshu Nosan Shokai, Inc.
Dairen, So. Manchuria, China
(See Adv. Index Page 178)

ENGLAND

Brown & Co., D. T.
Poulton-Le-Fylde, Lancashire, Eng-
land

Bunting & Co., G. A. (Garden and Flower
Seeds)
London, W. C. I., England

Clucas, Ltd., John L.
Ormskirk, England

Cooper, Taber & Co., Ltd.
London, England

Cullen & Sons, Thos.
Witham, England

Cundy, Chas. & Son
Sudbury, Suffolk, England

Daniels, C. S., & Son
Wymondham, Norfolk, England

Harrison & Sons
Leicester, England

Hurst & Son
152 Houndsditch, London, England

Johnson & Son., Ltd., W. W.
Boston, England

Kelway & Son
Langport, Somerset, England
(See Adv. Index Page 178)

King & Co., Ltd., E. W.
Coggeshall, Essex, England
(See Adv. Index Page 178)

Nutting & Sons, Ltd.
106 Southwark St., London, England

Pope & Chapman, Ltd.
Bishop's Stortford, England

Sharpe & Co., Ltd., Chas. (Peas and Tur-
nip)
Sleaford, England

Stuart & Co.
London, England

Sutton & Sons
Reading, England

Toogood & Sons, Ltd.
Southampton, England

Veitch & Son, Robert
Exeter, England

Ward & Co.
Bristol, England

Watkins & Simpson, Ltd.
London, England

Yates & Sons
Cheltenham, England

FINLAND

Aktiebolaget Agros
Helsingfors, Finland

FRANCE

Audier, Pierre
Rue Granet 1
Aix (Bouches de Rhone), France

Felix Blain,
St. Remyde Provence, France

Blanc, Jules
Jonquieres (Vaucluse), France

Boret, Victor
Saumur, France

Chauvet & Bonnet
Le Thor (Vaucluse), France

Clause, L.
Bretigny sur orge, Seine et Oise,
France

Davy
Juvisy, Seine et Oise, France

Denaiffe & Fils
Carigan (Ardennes), France

Desbois, A.
Grain sur l'Authion, France

Floriculture Hasslach
Avignon, France

Fontaine, Freres
Bourg Achard (Eure), France

Camut & Imbach
St. Etienne, Angers, France

Garcin, L. Bernard
St. Saturnin-lez-Avignon, Vaucluse,
France

Garcin & Mistral
St. Remy de Provence, France

Godineau Graines
Angers, France

Hamonet, A.
Angers, France

Leonard Lille,
Lyon-Villeurbanne, France

Neese, Paul
St. Remyde Provence, France

Paquet, Jos.
Boulevard Magnan, Nice, France

Picard & Co., A.
Orleans, France

Pucel, Jules
Cambrai (Nord), France

Robert & Holder,
Brain sur l'Anthion, France

Robineau & Francois
La Pyramide-Trelaze (M. & L.),
France

Rolland, Jacques
Nimes, France

E. de Rougemont
St. Remy-de-Provence, France

Roumanille Freres
St. Remy-de-Provence, France

Simon Louis Freres & Cie
Bruyeres-le-Chatel (S. & O.), France

Tezier, Freres
Paris, France
(See Adv. Index Page 178)

Vieillard, A.
Cambrai (Nord), France

Vilmorin Andreux & Co.
Paris, France

GERMANY

Beck & Co., Carl
Quedlinburg, Germany

Benary, Ernest (Garden and Flower Seeds)
Erfurt, Germany
(See Adv. Index Page 178)

Bitterhoffsohn, August
Berlin, Germany

Buchner, A. G., Rudolf (Garden and Flower
Seeds)

Erfurt, Germany
Buchner, A. G., Rudolf (Sugar Beet and
Mangel)

Erfurt, Germany

Carl, Franz
Quedlinburg, Germany

Deuber, Jr., Joh. Nachf.
Bamberg, Germany

Frapp, Leonhard
Krodpa in Thuringen, Germany

Gebruder Dippe, A. G.
Quedlinburg, Germany

Grashoff, Martin
Quedlinburg, Germany

Haage, Franz Anton
Erfurt, Germany

Haage & Schmidt
Erfurt, Germany

Haubner, August
Eisleben, Germany

Haubner & Co., Reinhold
Eisleben, Prov. Sachs., Germany

Heinemann, F. C.
Erfurt, Germany

CAULIFLOWER AND CABBAGE



J.E. OHLESENS ENKE
COPENHAGEN

KELWAY'S PEDIGREE STRAINS OF Old English FLOWER SEEDS

Write for our prices, stating, if possible, quantities required. Catalogue free. Trade only. Large or small orders. The Premier Raisers of improved kinds. 400 Diplomas, Gold Medals, etc.

KELWAY & SON
Wholesale Seed Growers
LANGPORT ENGLAND

ERNST BENARY

ERFURT

GERMANY

Leading Establishment since 1843 for

Choice Flower and Vegetable Seeds
WHOLESALE ONLY

Ask for my unique SEED CATALOGUE with COLOR CHART
and exact color denominations.

Manchuria Grown Seeds

Pedigree Strains of

FLOWER, VEGETABLE AND TREE SEEDS

Wholesale growers to the trade only

MANSHU NOSAN SHOKAI, Inc.
DAIREN, SOUTH MANCHURIA

FOREIGN GARDEN SEEDS—Continued

Hesse & Sohn, Robt. (Stocks and Pansies)
 Rieder Quedlinburg, Germany
 Hofmann, Joh. Thomas
 Nurnberg, Germany
 Just, Otto
 Aschersleben, Germany
 Mann, Otto
 Leipzig-Eutritzsch, Germany
 Martin, Franz
 Erfurt, Germany
 Mette, Heinr
 Quedlinburg, Germany
 Mohrenweiser, Chr.
 Altanweddingen, Germany
 Noth, Johs, Jr.
 Fischbach (Gotha), Germany
 Pabst, Karl
 Erfurt, Germany
 Philipp & Co., H. O.
 Hamburg, Germany
 Robra, Carl
 Aschersleben, Germany
 Rosenfelder, Oskar
 Bamberg, Germany
 Sachs, David
 Quedlinburg, Germany
 Schmidt, J. C.
 Erfurt, Germany
 Terra, A. G.
 Aschersleben, Germany
 Trapp, Leonhard
 Krolpa in Thuringen, Germany

HOLLAND

Dekker, Jac.
 Alkmaar, Holland
 Kloumers, P.
 Terneuse, Holland
 Overvoorde & Zoon
 Loosduinen, Holland
 Pannevis' Zaadteelt & Zaadhandel, C. W.
 Delft, Holland
 Remeus & Van Der Giessen, Ltd.
 Zwijndrecht, Holland
 Rood & Zoon, P.
 Bovenkarspel, Holland
 Schilpsand & Zoon, P. J.
 Hillegom, Holland
 Sluis, Abraham
 Enkhuizen, Holland
 Sluis Bros., Ltd.
 Enkhuizen, Holland
 Sluis & Groot
 Enkhuizen, Holland
 Spruijt & Co.
 Utrecht, Holland
 Corn. Van Beusekom
 Arnhem, Holland
Van den Berg Bros.
 Naaldwyk, Holland
 Van Der Veld, George
 Lisse, Holland
 Van Namen Bros.
 Zwijndrecht, Holland
 Van Waveren & Herzog, Ltd.
 Hillegom, Holland
 Wijs & Zoon, J. B.
 Amsterdam, Holland
 Zwaan & De Wiljes, Inc.
 Scheemda, Holland
 Zwaan & Van Der Molen, Inc.
 The Hague, Holland

HUNGARY

Hungary Seed Culture Co., Ltd.
 Budapest, Hungary
 Kazar Brothers
 Budapest, Hungary
 Kertesz, Ludwig
 Budapest, Hungary
 Mauthner, Ltd., Edmund
 Budapest, Hungary
 (See Adv. Index Page 178)
 "Terra" A. G.
 Budapest, Hungary

INDIA

Pocha & Sons, Pestonjee P.
 8 Napier Road, Poona, India

ITALY

Carmine Forasone Menella
 Torre Del Greco (Near Naples), Italy
 Ingegnoli Fratelli
 Milan and Rome, Italy
 Sgaravatti Fratelli
 Saonara (Padova) Italy

JAPAN

Mitsui & Co., Ltd.
 Tokio, Japan
 Sapporo Seed Farm
 Sapporo, Japan
 Yamato Seed & Imp. Co.
 Mejiro, Tokio, Japan

NEW ZEALAND

Cooper, Ltd., F.
 Wellington, New Zealand
 Nimmo & Blair
 Dunedin, New Zealand
 Yates & Co., Ltd., Arthur
 Auckland, New Zealand

NORWAY

Bauman, Jos.
 Kristiania, Norway
 A/S Eik's Maskinforretning
 Stavanger, Norway
 Elmholt, W. Olsen
 Kristiania, Norway
 Faelleskjøbet
 Kristiania, Norway
 Grimstad, Gartneri
 Grimstad, Norway
 Herlofson's Frohandel
 Kristiania, Norway
 Indal
 Hamar, Norway
 Michelet, A.
 Kristiania, Norway
 A. S. Norsk Froforsyning
 Hamar, Norway
 A. S. Norsk Fro.
 Kristiania, Norway
 Rogalands Faelleskjøb
 Stavanger, Norway
 Sandnes & Planterkole
 Sandnes (Jaeren), Norway

POLAND

Buszczynski & Sons K.
 Warsaw, Poland

PORTO RICO

Rubio, Ernesto
 Arecibo, P. R.
 (See Adv. Index Page 178)

RUSSIA

Amtorg Trading Corp.
 Moscow, Russia
 (See Adv. Index Page 178)

SCOTLAND

Bell, Ltd., David
 Leith, Scotland
 Cross Seed Co., Ltd., Alexander
 Glasgow, Scotland
 Lawson & Son, Ltd., Peter
 Edinburgh, Scotland

SWEDEN

Algot Holmberg & Son
 Norrköping, Sweden
 Allmanna Svenska Utsädesaktiebolaget
 Svalof, Sweden
 Engstrom, Aktiebolaget Carl
 Eslof, Sweden
 Goteborgs Tradgardsforening
 Gothenburg, Sweden
 Holmberg & Son, Algot
 Norrköping, Sweden

SWITZERLAND

Dammann, F.
 Lugano, Switzerland
 Mauser, Emil
 Zurich, Switzerland



SUHR'S Prize-winning Snowball Cauliflower, at the Convention of the Vegetable Growers' Association of America, held at South Bend, Ind., September 10-15, 1928

WHOLESALE GROWERS

SELECTED DANISH GARDEN SEED

OUR SPECIALTY IS

CAULIFLOWER AND CABBAGE SEED

Our Own Production—None to Excess
Send us your inquiries

SUHR'S
E E D
S U R E
U C C E S S

E. SUHR COMPANY

Einar Suhr-John Mosbell
Seed Growers and Merchants
NEW YORK CITY, N. Y.

SUHR'S
E E D
S U R E
U C C E S S

ERNESTO RUBIO

P. O. BOX 237
ARECIBO, PORTO RICO

- 1876 Jaime Rubio & Hijo
- 1880 Rubio, Esteves & Co.
- 1884 Ernesto Rubio
- 1904 E. Rubio & Hijos
- 1917 E. Rubio & Hijos, Sucrs.
S. en C.
- 1920 E. Rubio & Hijos, Sucrs.
Inc.
- 1924 Ernesto Rubio

MY SPECIALTIES:

**ONION SEEDS AND
ONION SETS.**

Also
VEGETABLE SEEDS:

Tomatoes	Cabbage
Egg Plant	Carrot
Pepper	Turnip
Lettuce	Parsley
Beets	Swisschard

Write and send samples of what you have to offer in my lines.

CABBAGE SEED

ASK

A. HANSEN

**KASTRUP
AMAGER
DENMARK**

Specialist—Grower since 1873

Formerly COPENHAGEN F

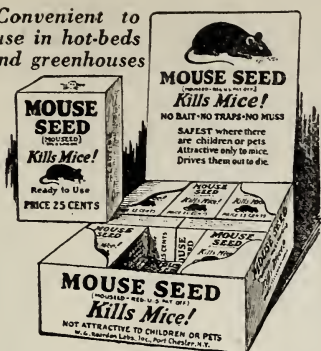
NAMES OF FIELD SEEDS IN FOREIGN LANGUAGES

(Prepared by the U. S. Department of Agriculture)

ENGLISH	LATIN	GERMAN	FRENCH
Red clover.....	<i>Trifolium Pratense</i> ...	Rotklee; Wiesenklee..	Trèfle violet
Alsike clover.....	" <i>hybridum</i> ..	Bastardklee	Trèfle hybride
White clover.....	" <i>repens</i> ...	Wiessklee	Trèfle blanc
Crimson clover.....	" <i>incarnatum</i> ..	Inkarnatklee	Trèfle incarnat
Biennial white sweet clover.....	<i>Melilotus alba</i>	weiser Steinklee.....	Trèfle de Bokhara
Lespedeza	<i>Lespedeza striata</i>	Japanischer Klee.....	Trèfle du Japan
Bur clover.....	<i>Medicago arabica</i>	rauher Schneckenklee..	Minette punaie
Alfalfa	<i>Medicago sativa</i>	Luzerne	Luzerne
Timothy	<i>Phleum pratense</i>	Timothygrass; Wie- senlieschgras	Flèole des prés
	<i>Agrostis alba</i> or		
Redtop	<i>Agrostis palustris</i> ...	Fioringras	Agrostide tracant
Orchard grass.....	<i>Dactylis glomerata</i> ...	Knaulgras	Dactyle pelotonné
Kentucky bluegrass...	<i>Poa pratensis</i>	Wiesenrispengras ...	Paturin des prés
Bermuda grass.....	<i>Cynodon dactylon</i>	echter Hundszahn....	Herbe des Bermudes
Brome grass.....	<i>Bromus inermis</i>	grannenlose Trespe..	Brome de Hongrie
Meadow Fescue....	<i>Festuca elatior</i>	Wiesenschwingel ...	Fêtuque des prés
Italian rye grass....	<i>Lolium multiflorum</i> ..	italienisches Raigras..	Raygrass d' Italie
Perennial rye grass..	<i>Lolium perenne</i>	englisches Raigras; Dauerlolch	Raygrass anglais
Hairy vetch.....	<i>Vicia villosa</i>	zottige Wicke; Sandwicke	Vesce velu
Spring vetch.....	<i>Vicia sativa</i>	Saatwicke	Vesce de printemps
Common millet.....	<i>Chaetochloa italica</i> ...	Echtehirse	Millet blanc rond ordinaire
German millet.....	<i>Chaetochloa italica</i> ...	Deutschehirse	Moha de Hongrie
Japanese millet.....	<i>Echinochloa frumentacea</i>	Huhnerhirse	Millet du Japan
Broomcorn millet....	<i>Panicum miliaceum</i> ...	Rispenhirse	Millet commun
Sorghums (Grain)..	<i>Holcus sorghum</i> *....	Mohrenhirse	Sorgho
Sorghums (Sweet)..	<i>Holcus sorghum</i>	Zuckermohrhirse ...	Sorgho sucré
Johnson grass.....	<i>Holcus halepense</i>	Aleppo-Mohrenhirse	Sorgho d' Alep.
Rape	<i>Brassica napus</i>	Raps	Colza
Wheat	<i>Triticum vulgare</i>	Weizen	Blés; Froment
Corn	<i>Zea mays</i>	Mais	Mais
Barley	<i>Hordeum vulgare</i>	Gerste	Orge
Oats	<i>Avena sativa</i>	Hafer	Avoines
Rye	<i>Secale cereale</i>	Roggen	Seigle
Flax	<i>Linum usitatissimum</i> ..	Leinsaat	Javard
Buckwheat	<i>Fagopyrum esculentum</i>	Buchweizen	Blé noir
Cotton	<i>Gossypium</i>	Baumwollpflanze ...	Cottonier
Canada field pea....	<i>Pisum arvense</i>	Felderbse; Saaterbse..	Pois des champs
Cowpeas	<i>Vigna sinensis</i>	Kuherbse	Dolique de Chine
Soybeans	<i>Soja max</i>	Sojabohne	Soja

*Other Latin names are *Sorghum sorghum* and *Andropogon sorghum*. *Holcus sorghum* is the name accepted by the Division of Botany, U. S. Department of Agriculture.

Convenient to
use in hot-beds
and greenhouses



**You, especially
need this seed!**

S EED men, more than most other store keepers, are at the mercy of mice. Yet many exterminators and preventives are difficult to use. Mouse Seed offers the appropriate answer. "A Saucer and the Seed is All You Need."

Tiny, natural seeds treated with a chemical attractive to mice. They eat the seed, then go outside to die. But Mouse Seed is not attractive to household pets.

Stock Mouse Seed—and use Mouse Seed. Your own results will show you its big selling possibilities. And you will find—like so many seed men—what a profit opportunity Mouse Seed offers—\$1.50 profit on each \$2 purchase.

RETAILERS—Display Mouse Seed on your counters. It sells itself.

WHOLESALE — Show Mouse Seed in your Catalogs. We will supply cuts without charge.

Write for our proposition which offers you unusual profit margin on small outlay.

W. G. REARDON LABORATORIES, Inc.
9 Mill St., Port Chester, N. Y.

**MOUSE
SEED**

(MOUSEED)

CLEANER SAFER SURER
Nationally Advertised to More
Than 7,500,000 Readers

AMERICAN BULB COMPANY

CHICAGO-NEW YORK

**A. B. C.
"SUPREME"
QUALITY**

*For the
Florist - Nurseryman
Seedsman*

Japanese Lily Bulbs
German Valley Pips
English Manetti Rose Stock
Cyclamen and Asparagus
Seed
Grnhse. Flw. Sweet Pea Seeds
and all
Florists' Flower Seeds
Fertilizers and Insecticides
Sphagnum and Sheet Moss
All Growers' Necessities
Dutch Bulbs
French Bulbs
Gladioli and Canna Bulbs
Tuberose and Caladiums
Begonias and Gloxinias
Freesia Bulbs
Calla Bulbs
Roses, Ferns
Greenhouse Plants
Peonies
Special Cut Flower Varieties
And all Standard Varieties
of Perennial Plants

**Seasonable Catalogs
Mailed Free**

AMERICAN BULB CO.
1335-1341 W. Randolph St.
CHICAGO
6 MURRAY STREET
(West of Broadway)
NEW YORK

BULBS, PLANTS AND MISCELLANEOUS SEEDS

BULBS—AMERICAN DEALERS

- Alexander, J. K.
E. Bridgewater, Mass.
American Bulb Co.
Chicago, Ill.
(See Adv. Index Page 178)
- American Rose & Plant Co.
Springfield, Ohio
- Barnard Co., The W. W.**
Chicago, Ill.
(See Adv. Index Page 178)
- Barteldes Seed Co.
Lawrence, Kans.
- Bodger & Sons Co., John**
El Monte, Los Angeles County, Calif.
(See Adv. Index Page 178)
- Bolgiano Seed Co., J.
Baltimore, Md.
- Bolgiano & Co., F. W.
Washington, D. C.
- Bonnewitz Wholesale Gardens
Van Wert, Ohio
- Brown Bulb Ranch
Capitola, Cal.
- Bruce & Co., Ltd., John A.**
Hamilton, Canada
(See Adv. Index Page 178)
- Buchanan Seed Company R P
Memphis, Tenn.
- Bulst Co., Robert**
Philadelphia, Pa.
(See Adv. Index Page 178)
- Barpee & Co., W. Atlee**
Philadelphia, Pa.
(See Adv. Index Page 178)
- Bushy Flower Gardens
Wake, Va.
- Childs Seed Co., John Lewis
Floral Park, L. I., N. Y.
- Clarke & Son, W. B.
San Jose, Calif.
- Cornell Seed Co.**
St. Louis, Mo.
(See Adv. Index Page 178)
- Croom & Bro., John F.
Magnolia, N. C.
- Cumberland Valley Nursery Co., Inc.
McMinnville, Tenn.
- Diener, Richard
Kentfield, Cal.
- Enid Floral Co.
Enid, Okla.
- Perry Seed Co.
Boston, Mass.
- Forbes & Co., Alex.
Newark, N. J.
- Gelser Bros.
Dalton, N. Y.
- General Bulb Co.
Chicago, Ill.
- Gibbs, W. Thurston
Morocco, Ind.
- Gill Bros. Seed Co. (Dahlia)
Portland, Ore.
- Goodhold Floral Gardens
Mentor, Ohio
- Grootendorst, A. M.
Benton Harbor, Mich.
- Henderson & Co., Peter**
New York City, N. Y.
(See Adv. Index Page 178)
- Holland-American Seed Co.
Grand Rapids, Mich.
- Holst-Knudsen, S.
New York, N. Y.
- Humphrey, John B.
Petaskala, Ohio
- Hunter, S. B.
Magnolia, N. C.
- Hyde Co., H. A.
Watsonville, Calif.
- Imperial Gardens
Sugarland, Texas
- Indiana Dahlia Farms
New Albany, Indiana
- Ireland, Z. Jay**
Pleasant Valley, N. Y.
(See Adv. Index Page 178)
- Kunderd, A. E. (Gladiola)
Goshen, Ind.
- Lawler, George**
Gardenville, Tacoma, Wash.
(See Adv. Index Page 178)
- Leonard Seed Co.**
Chicago, Ill.
(See Adv. Index Page 178)
- Long, J. D.
Boulder, Colo.
- Long, W. P.
West Grove, Pa.
- McCullough's Sons Co., J. M.**
Cincinnati, Ohio
(See Adv. Index Page 178)
- McHutchison & Co.**
New York, N. Y.
(See Adv. Index Page 178)
- Main, Arthur B.
Santa Cruz, Calif.
- Market Gardeners Seed Co.**
Cincinnati, Ohio
(See Adv. Index Page 178)
- Meyer Seed Company
Baltimore, Md.
- Minnetonka Gladiolus Farms
R. 3, Hopkins, Minn.
- Morris & Snow Seed Co.
Los Angeles, Calif.
- Never Idle Gardens, Inc.
Davenport, Fla.
- North Star Nursery
Onarga, Ill.
- Norton, H. G.
Perry, Ohio
- Phelps, Will
Little York, Ill.
- Pinner & Co., Inc.
Suffolk, Va.
- Puget Sound Seed Co.
La Conner, Wash.
- Quality Seed & Bulb Co.
Chicago, Ill.
- Roos, Jelle
Concord, Mass.
- Routledge Seed & Floral Co.
Portland, Ore.
- Rugowski Seed Co., J. K.
Manitowoc, Wis.
- Rynveld & Sons, F.
New York City, N. Y.
- Schell, Inc., Walter S.**
Harrisburg, Pa.
(See Adv. Index Page 178)
- Schling Seedsmen, Inc., Max
New York, N. Y.
- Schoorl, Adrian J.
San Francisco, Calif.
- Schwake & Co., Inc., Chas.
New York, N. Y.
- Scott Co., I. W.
Pittsburgh, Pa.
- State Nursery & Seed Co.
Helena, Mont.
- Stumpp & Walter Co.**
New York City, N. Y.
(See Adv. Index Page 178)
- Swedberg Bros. Nurseries
Battle Lake, Minn.
- Templin-Bradley Co.
Cleveland, Ohio
- United Bulb Growers, Inc.
New York City, N. Y.
- Van Antwerp's Seed Store**
Mobile, Ala.
(See Adv. Index Page 178)

Lawler's

BULBS

In Hundred or Car Lots

Soil and climate conditions of Washington plus careful stock selections enable me to offer popular varieties of such size, beauty and sturdy thrift that they create admiration and a ready demand wherever introduced.

WRITE FOR LISTS and DEALERS' PRICES

Be the Lawler Bulb Dealer in Your Territory

Reap a Harvest of Profits and Pleased Customers

GEORGE LAWLER

WHOLESALE BULB GROWER
Gardenville—Tacoma, Wash.



Good Money for Every Seedsmen

Who Will Catalog Chinese Cinnamon Vines



Immense quantities sold and sales increase each year. Cinnamon Vines pay big; they are sure to grow and sure to please and make friends. The tubers are nice and clean to handle, never rot, are easy to mail, require no packing and you can deliver them by mail, express or over your counters from November until June. Also a limited quantity of madeira vine tubers. Try them and be convinced. Electros supplied. Trade list and particulars free. Yours for more business.

Z. JAY IRELAND

Successor to A. T. Cook

Pleasant Valley

New York

Unusual Varieties in Seeds

The nature of our business is such that we are frequently in a position to offer in addition to best strains of standard varieties of seeds:

Rarely Called-for Vegetables
Choice Imported Flower Seed
The Lesser-used Grasses

Stumpp & Walter Co

30-32 Barclay St., New York

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Continued**BULBS—Continued**

Van Zonneveld Bros. & Philippo
New York City, N. Y.
Vaughan's Seed Store
Chicago, Ill.
Vick's Sons, James
Rochester, N. Y.
Vos & Son, P.
Grand Rapids, Mich.
Weller Nurseries Co.
Holland, Mich.
White Seed Co., Buxton
Elizabeth City, N. C.
Younkerman Seed Co.
Council Bluffs, Iowa
Zangen, O. V.
Davenport, Fla.

BULBS—FOREIGN DEALERS**FRANCE**

Blain, Felix
St. Remy de Provence, France
Rynveld & Cie
Ollioules, Var, France

GERMANY

Berham, Chr.
Stendal, Germany
Bernary, Ernst
Erfurt, Germany
Chehler, Carl
Halberstadt, Germany
Haage & Schmidt
Erfurt, Germany
Heinemann, F. C.
Erfurt, Germany
Hesse & Sohn, Rob.
Rieder am Hacz, Germany
Kaiser, Ferdinand
Eisleben, Germany
Klisning Sohn, C. L.
Barth, Germany
Leib, Wilhelm
Arnstadt, Germany
Lieban & Co.
Erfurt, Germany
Lorenz, Chr.
Erfurt, Germany
Pabst, Carl
Erfurt, Germany
Pape & Bergmann
Quedlinberg, Germany
Pflizer, Wilhelm
Stuttgart, Germany
Putz, Otto
Erfurt, Germany
Reine, Schoo & Co.
Fornosch-Holstein, Germany
Roemer, Friedrich
Quedlinberg, Germany
Schraeder, C. G.
Saltwedel, Germany
Stenger & Rotter
Erfurt, Germany
Wehranpfannig, A.
Quedlinberg, Germany
Wiegelt & Co.
Erfurt, Germany

HOLLAND

Byvoet Bros.
Overeen, Haarlem, Holland
De Graaf Bros.
Noordwyk, Holland
De Graaf & Sons, H.
Lisse, Holland
Eldering & Son, W. J.
Overeen, Holland
Grullemans & Sons, J. J.
Lisse, Holland
Jonkheer & Sons, C.
Hillegom, Holland
Segers Brothers
Lisse, Holland
Segers, Gerrit
Lisse, Holland
Steelman & Sons, C. J.
Sassenheim, Holland

Tegelaar Bros.
Lisse, Holland
Van Der Schoot, R. A.
Hillegom, Holland
Van Der Veld, George
Lisse, Holland
Van Waveren Stamhois Nurseries
Hillegom, Holland

JAPAN

Bunting & Co., Isaac
Yokohama, Japan
Sakata & Co., T.
Yokohama, Japan

SWEDEN

Algot Holmberg & Sen
Norrkoping, Sweden

NURSERY STOCK**Allen Nurseries**

Seaford, Del.

Bohlender Sons, Peter
Tippecanoe City, Ohio
Campbell, F. W. (Ornamentals)
Detroit, Mich.
Clark, John H. (Ornamentals)
Chariton, Iowa
Clinton Falls Seed & Nursery Co.
Owatonna, Minn.
Crawford Gardens (Peonies, Irises and
Perennials)
La Porte, Ind.
Cutler & Downing Co.
Benton Harbor, Mich.
Ernst Nurseries
Eaton, Ohio
Forest Nursery Co.
McMinnville, Tenn.
Gardens of the Blue Ridge
Ashford, McDowell Co., No. Carolina
Harmel Peony Co.
Berlin, Md.
Harrison Nursery Co.
York, Nebr.
Hill Nursery, D., The
Dundee, Ill.
Naperville Nurseries
Naperville, Ill.
(See Adv. Index Page 178)
North-Eastern Forestry Co., The
Cheshire, Conn.
Northfield Seed & Nursery Co.
Northfield, Minn.
Piedmont Forestry Co.
Bound Brook, N. J.
Smith Co., W. & T.
Geneva, N. Y.
Sonderregger Nurseries & Seed House
Beatrice, Nebr.
State Nursery & Seed Co.
Helena, Mont.
Storrs & Harrison Co.
Painesville, Ohio
Thomas, W. W.
Anna, Ill.
Weaver Gardens Co., The
Wichita, Kans.
Westminster Nurseries, The
Westminster, Md.
Willadean Nurseries, Inc.
Sparta, Ky.

CACTI

Texas Cacti Co.,
El Paso, Texas

EVERGREENS

Conwell, Inc., H. Ernest
Milton, Dela.
Cumberland Valley Nursery Co., Inc.
McMinnville, Tenn.



CENTRAL LOCATION

We Offer the Best of Service
Trees, Evergreens, Shrubs
Vines and Perennials
Rock Garden Plants

300 Acres Devoted to Growing of First Class
Ornamental Nursery Stock

VISITORS ARE WELCOME

Telephone Naperville One

NAPERVILLE NURSERIES

NAPERVILLE, DU PAGE COUNTY, ILLINOIS

ESTABLISHED IN 1866

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Continued**EVERGREENS—Continued****Naperville Nurseries****Naperville, Ill.**

(See Adv. Index Page 178)

North-Eastern Forestry Co.**Cheshire, Conn.****Rosebank Nursery Co.****Huntsville, Ala.****Schmleske, Wm. F.****Binghamton, N. Y.****State Nursery & Seed Co.****Helena, Mont.****Swedberg Bros. Nurseries****Battle Lake, Minn.****FERNS****Ferndale Nursery****Askov, Minn.****FRUIT TREES****Cumberland Valley Nursery Co., Inc.****McMinnville, Tenn.****Lake View Nurseries****Rochester, N. Y.****May Seed & Nursery Co.****Shenandoah, Iowa****Munson Nurseries****Denison, Texas****Potter Sales Nursery Co.****McMinnville, Tenn.****Rosebank Nursery Co.****Huntsville, Ala.****Smithville Nursery Co.****Smithville, Tenn.****FRUIT—SMALL****Cumberland Valley Nursery Co., Inc.****McMinnville, Tenn.****Schifferli & Son Nurseries, The F. E.****Fredonia, N. Y.****GRAFTING WAX****Clark & Son, Walter E.****Milford, Conn.**

(See Adv. Index Page 178)

GRAPE VINES**Munson Nurseries****Denison, Texas****ORNAMENTALS****Brainard's Nurseries & Greenhouses, Inc.****Des Moines, Iowa****Cumberland Valley Nursery Co., Inc.****McMinnville, Tenn.****Naperville Nurseries****Naperville, Ill.**

(See Adv. Index Page 178)

PERENNIALS**Locust Valley Dahlia Farms****Locust Valley, L. I., N. Y.****Naperville Nurseries****Naperville, Ill.**

(See Adv. Index Page 178)

ROSE BUSHES**Howard Rose Co., Inc.****Hemet, Calif.**

(See Adv. Index Page 178)

WATER PLANTS**Terrell's Aquatic Farm****Oshkosh, Wis.****ONION SETS****Algers, K. W.****Crystal City, Tex.****Anderson, Wm. B.****Norwood Park, Chicago, Ill.****Barnard Co., The W. W.****Chicago, Ill.**

(See Adv. Index Page 178)

Blamberg Bros., Inc.**Baltimore, Md.**

(See Adv. Index Page 178)

Bolgiano Seed Co., The J.**Baltimore, Md.****Bruce & Co., Ltd., John A.****Hamilton, Ont., Canada**

(See Adv. Index Page 178)

Buist Co., Robert**Philadelphia, Pa.**

(See Adv. Index Page 178)

Chesmore Seed Co.**St. Joseph, Mo.****Chester & Co., H. H.****Chicago, Ill.****Comstock Ferre & Co.****Wethersfield, Conn.**

(See Adv. Index Page 178)

Condon Bros. Seedsmen**Rockford, Ill.**

(See Adv. Index Page 178)

Cornell Seed Co.**St. Louis, Mo.**

(See Adv. Index Page 178)

Davenport Seed Co.**Davenport, Iowa****Grand Junction Seed Co.****Grand Junction, Colo.**

(See Adv. Index Page 178)

Gridley Maxon Co.**Chicago, Ill.****Hafendorfer, G. J.****Greeley, Colo.****Hall Seed Co.****Louisville, Ky.**

(See Adv. Index Page 178)

Harden, Hamilton & Lewman**Louisville, Ky.****Hart Seed Co., Chas. C.****Wethersfield, Conn.**

(See Adv. Index Page 178)

Hayes Labish Farms**Salem, Oregon****Hollenbach, Peter****Chicago, Ill.**

(See Adv. Index Page 178)

Hunkel Co., G. H.**Milwaukee, Wis.****Johnson, Inc., J. Oliver****Chicago, Ill.****Kaufmann's Onion Set Warehouse****South Holland, Ill.****Landreth Seed Co., D.****Bristol, Pa.**

(See Adv. Index Page 178)

Leonard Seed Co.**Chicago, Ill.**

(See Adv. Index Page 178)

Louisville Seed Co.**Louisville, Ky.****Mangelsdorf Seed Co.****Atchison, Kan.****Manitowoc Seed Co.****Manitowoc, Wis.****Meeter & Son, John****Lansing, Ill.****Nebraska Seed Co.****Omaha, Neb.****Northrup, King & Co.****Minneapolis, Minn.**

(See Adv. Index Page 178)

Ohio Valley Seed Co.**Evansville, Ind.****Owensboro Plant & Seed Co.****Owensboro, Ky.****Page Seed Co.****Greene, N. Y.**

(See Adv. Index Page 178)

Peerbolte Co., Peter**South Holland, Ill.****Portland Seed Co.****Portland, Ore.****Quincy Seed Co.****Quincy, Ill.****Rau, Lawrence****Chicago, Ill.****Rubio, Ernesto****Arecibo, Porto Rico**

(See Adv. Index Page 178)

TROWBRIDGE GRAFTING WAX

"OLDEST and BEST"

Used by Nurserymen and
Best Horticulturists from
Coast to Coast for over 60
years. An easy seller.

Ask us about the new elastic
paraffin wax, "Parapin Wax."
It protects orchard trees against
attacks by mice and borers.
Can graft in hottest climates
by this new method.

Get our Price on Melting Pots

WALTER E. CLARK & SON
Milford Connecticut



ROSE BUSHES

DORMANT FIELD-GROWN
MAIL ORDER SIZES

1½ Grade Hybrid Teas
14 to 18 Inches, 2 Branches

WRITE FOR LIST, ALSO
Showing Full Assortment No. 1 Grade
Winter Harvest

HOWARD ROSE CO.
HEMET CALIFORNIA

ONION SETS

*When in the market
for choice sets be sure
that you write or
wire us.*

BERMUDAS & PEARLS
for Fall 1929

**PETER
HOLLENBACH
SEEDS**

808 W. Lake Street
CHICAGO

SEEDS ONION SETS

Seed farms located in
various States. We pro-
duce all standard varie-
ties and specialties for
the **WHOLESALE**
TRADE.

Established in 1865

Correspondence solicited
on both spot and future
Garden Seeds

S. D. WOODRUFF & SONS
ORANGE CONNECTICUT

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Continued

ONION SETS—Continued

Reeve, Geo.
Chicago, Ill.
Schilder Bros.
Chillicothe, Ohio
Sherman-Magnolia Seed Co.
Dallas, Texas
Snapp & Sons, J. P.
Limestone, Tenn.
Spokane Seed Co.
Spokane, Wash.
Standard Seed Co.
Kansas City, Mo.
Steele, Briggs Seed Co.
Toronto, Canada
(See Adv. Index Page 178)
Sullivan, J. G.
Asherton, Tex.
(See Adv. Index Page 178)
Van Antwerp's Seed Store
Mobile, Ala.
(See Adv. Index Page 178)
Van Duersen Bros.
Riverdale, Ill.
Vaughan's Seed Store
Chicago, Ill.
Waterman, Chas.
So. Holland, Ill.
Wetsel Seed Co.
Harrisonburg, Va.
White & Sons, D. A.
Salem, Ore.
Wood, Stubbs & Co.
Louisville, Ky.
Woodruff & Co., F. H.
Milford, Conn.
Woodruff & Sons, S. D.
Orange, Conn.
(See Adv. Index Page 178)
Woodruff & Sons, S. D.
New York, N. Y.
Younkerman Seed Co.
Council Bluffs, Iowa

PLANTS—FLOWER

Alexander, J. K.
Bridgewater, Mass.
Allen Nurseries
Seaford, Del.
American Bulb Company
Chicago, Ill.
(See Adv. Index Page 178)
American Rose & Plant Co.
Springfield, Ohio
Brazil Dahlia Farm
Brazil, Ind.
Bushy Flower Gardens
Bushy, Va.
Chautauqua Flower Fields
Bemis Point, N. Y.
Childs Seed Co., John Lewis
Floral Park, L. I., N. Y.
Cook Seed Co.
Waterford, N. Y.
Diener Co., Inc., Richard
Kentfield, Calif.
Perry Seed Co.
Boston, Mass.
Hardy Plant & Pansy Farm
Baraboo, Wis.
Hyde Co., H. A.
Watsonville, Calif.
Ireland, Z. Jay
Pleasant Valley, N. Y.
(See Adv. Index Page 178)
Lind Plant Farms
Cotulla, Texas
Long Island Dahlia Gardens
Hicksville, L. I., N. Y.
McGregor Bros. Co.
Springfield, Ohio
McHutchison & Co.
New York, N. Y.
(See Adv. Index Page 178)
Merritt, John W.
Farmingdale, L. I., N. Y.
Myers & Scott
Van Buren, Ark.

Onarga Nursery Co.
Onarga, Ill.
Portland Seed Co.
Portland, Ore.
Rosebank Nursery Co.
Huntsville, Ala.
Roudabush & Co., W. P.
Wilmington, N. C.
Schaumburg, Henry
Hammon, N. J.
Schmeiske, Wm. F.
Binghamton, N. Y.
Skidelsky & Co., S. S.
New York City, N. Y.
Smith Plant Farm, E. C.
Milano, Texas
State Nursery & Seed Co.
Helena, Mont.
Texas Seed & Plant Co.
Dallas, Texas
Vick's Sons, James
Rochester, N. Y.
Weller Nurseries Co.
Holland, Mich.

VEGETABLE PLANTS

Albany Plant & Seed Co.
Albany, Ga.
Alger, K. W. (Grower)
Crystal City, Texas
Alvy, Jack
Van Buren, Ark.
Amzi Godden Seed & Grain Co., Inc.
Birmingham, Ala.
Blackshear Plant Co.
Blackshear, Ga.
Bolgiano & Co., F. W.
Washington, D. C.
Bruce Wholesale Plant Co.
Waldosta, Ga.
Carolina Seed & Plant Co.
Florence, S. C.
Clifton, J. A.
Russellville, Ark.
Councill Co., J. P.
Franklin, Va.
Councill Seed Co.
Franklin, Va.
Perry Seed Co.
Boston, Mass.
Fulwood, F. D.
Tifton, Ga.
Geraty & Co., Wm. C.
Yonges Island, S. C.
Grand Junction Seed Co.
Grand Junction, Colo.
(See Adv. Index Page 178)
Grossmann & Son, W.
Petersburg, Va.
Hammell Seed Farms, Geo. Q.
Delanco, N. J.
Harvey Seed Co.
Montgomery, Ala.
Hollywood Farms
Pavo, Ga.
Hoopes Co., J. E. (Plants and Asparagus
Roots)
Muscatine, Iowa
Jefferson Farms, The
Albany, Ga.
Jouannet, Alfred
Mt. Pleasant, S. C.
Kille, Willard B.
Swedesboro, N. J.
Ludden & Son, Orol
Sewell, N. J.
Lehmann's Seed Store
Baton Rouge, La.
Leonard, I. & J. L.
Iona, N. J.
Lind Plant Farm
Cotulla, Texas
May & Son, Inc., W. H.
Alexandria, Va.
Mixon Seed Co., W. H.
Charleston, S. C.

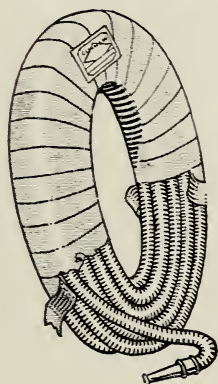
Additional Profits

— for the Dealer

Satisfaction

— for the Customer

WITH DIAMOND GARDEN HOSE



Wrapped in handy packages of 25-foot and 50-foot lengths, coupled ready for use.

Because:

1. It is made of first-class materials throughout; tough rubber, strong cotton braids, water-cured under high pressure.
2. It will stand all sorts of wear and give satisfactory service for many seasons.
3. You can put in a stock with a small investment. Only one size is necessary— $\frac{5}{8}$ ".
4. Each package carries its own advertising, and when displayed is practically self-selling.
5. Free advertising helps are furnished with the hose—electros, blotters, postcards, letterheads, telephone slips, etc.

**DO NOT OVERLOOK THIS OPPORTUNITY TO ADD TO
YOUR 1929 PROFITS**

Write our nearest Branch for full information and prices

THE DIAMOND RUBBER COMPANY, Inc.

Dept. H.

Akron, Ohio

Atlanta
Chicago

Boston
Dallas

Kansas City
Los Angeles

New York
Seattle

Philadelphia
San Francisco

Diamond

GARDEN HOSE



*It will pay you
well*

*to display
and sell*

Mulford Cultures

FOR LEGUMES

Every sale of legume seeds should include Mulford Cultures. They make satisfied customers and repeat orders, not only for cultures but for seeds as well.

Mulford Cultures are prepared and tested in the world's largest Biological Laboratories, with the utmost scientific care and skill. Economical and easy to use. The sealed bottle insures purity.

Mulford Cultures offer additional inducements for a listing in your catalogue. Display them and increase your returns on this profitable essential.

Selling helps include advertising cuts and imprinted, descriptive folders for your mailing list. Your request brings them.



**Increase Your Sales—Increase Your Profits—
Increase Your Satisfied Customers**

H. K. MULFORD COMPANY

PHILADELPHIA, U. S. A.

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Continued

VEGETABLE PLANTS—Continued

Myers Seed & Plant Co.
Tifton, Ga.
Old Dominion Plant Co.
Franklin, Va.
Omega Plant Co.
Omega, Ga.
Owensboro Plant & Seed Co.
Owensboro, Ky.
Ozark Seed & Plant Co.
Nashville, Ark.
Capital Fuel & Feed Co.
Phoenix, Ariz.
Piedmont Plant Co.
Albany, Ga.
Riverview Farms
Bridgeton, N. J.
Rochelle & Sons, F. W.
Chester, N. J.
Rochelle, Paul F.
Morristown, N. J.
Ross Bros. Seed Co.
Wichita, Kan.
Roudabush & Co., W. P.
Wilmington, N. C.
Schroer Plant Co.
Valdosta, Ga.
Stevenson, G. W.
Fordyce, Ark.
Stockton Seed Co.
Stockton, Cal.
Tidewater Plant Co.
Franklin, Va.
Tingle, Leamon G.
Pittsville, Md.
Todd, Geo. M.
Greensboro, N. C.
Van Antwerp's Seed Store
Mobile, Ala.
(See Adv. Index Page 178)
Vick's Sons, James
Rochester, N. Y.
Wards Gardens
Mobile, Ala.
Williams, W. W.
Quitman, Georgia
Wood & Son, T. W.
Richmond, Va.
Wyatt & Sons Co., Job P.
Raleigh, N. C.
Zeplitz, Rolf
Lima, Ohio

SEEDS—MISCELLANEOUS

CANARY SEED

Blamberg Bros.
Baltimore, Md.
(See Adv. Index Page 178)
Cornell Seed Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Crawford, Keen & Co.
New York City, N. Y.
Curtin Company, George L.
New York, N. Y.
Dickinson Co., Albert
Chicago, Ill.
German, Gale T.
New York, N. Y.
Herbst Bros.
New York City, N. Y.
(See Adv. Index Page 178)
Hinton & Co., Inc.
New York, N. Y.
Johnson, Inc., J. Oliver
Chicago, Ill.
Justrite Co., The
Milwaukee, Wis.
Kaufmann's Onion Set Warehouse
South Holland, Ill.
Kellogg-Kelly Seed Co.
St. Joseph, Mo.

Magnesia Products Co.
Milwaukee, Wis.
McCullough Seed Co., The J. Chas.
Cincinnati, Ohio
Nungesser-Dickinson Seed Co.
New York, N. Y.
Philadelphia Seed Co.
Philadelphia, Pa.
(See Adv. Index Page 178)
Radwaner Seed Co., I. L.
New York, N. Y.
(See Adv. Index Page 178)
Scarlett & Co., Wm. G.
Baltimore, Md.
Standard Seed Co.
Kansas City, Mo.
Von Damm, F. A.
Brooklyn, N. Y.

LAWN GRASS SEED

American Seed Co.
Detroit, Mich.
Barnard Co., W. W.
Chicago, Ill.
(See Adv. Index Page 178)
Bent Grass Co.
Hoopeston, Ill.
Bernham, Inc.
New York, N. Y.
Brady's Nursery
White Bear Lake, Minn.
Cornell Seed Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Craver-Dickinson Seed Co.
Buffalo, N. Y.
Dickinson Co., Albert
Chicago, Ill.
Doughten Seed Co.
Jersey City, N. J.
Holst-Knudsen, S.
New York, N. Y.
Hunkel Co., G. H.
Milwaukee, Wis.
Johnson, Inc., J. Oliver
Chicago, Ill.
Kellogg-Kelly Seed Co.
St. Joseph, Mo.
Leonard Seed Co.
Chicago, Ill.
(See Adv. Index Page 178)
Louisville Seed Co.
Louisville, Ky.
McCullough Seed Co., The J. Chas.
Cincinnati, Ohio
Nungesser-Dickinson Seed Co.
New York City, N. Y.
O. & M. Seed Co., The
Green Springs, Ohio
(See Adv. Index Page 178)
Philadelphia Seed Co.
Philadelphia, Pa.
(See Adv. Index Page 178)
Scarlett & Co., Wm. G.
Baltimore, Md.
Scott Co., I. W.
Pittsburgh, Pa.
Seaboard Seed Co.
Philadelphia, Pa.
(See Adv. Index Page 178)
Sevin-Vincent Seed Co.
San Francisco, Calif.
Steinhardt & Nordlinger
New York, N. Y.
Templin-Bradley Co.
Cleveland, Ohio
Williamson, Garfield
New York City, N. Y.
POP CORN
American Popcorn Co.
Sioux City, Iowa
Dickinson Co., Albert
Chicago, Ill.
Cornell Seed Co.
St. Louis, Mo.
(See Adv. Index Page 178).
Tuttle Popcorn Co., R. M.
Spencer, Iowa

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Continued

POTATO SEED

Interstate Seed & Grain Co.

Fargo, N. D.

(See Adv. Index Page 178)

SEED POTATOES

Barnes Co., O. J.

Grand Forks, N. D.

Cochrane Seed Co., T. H.

Portage, Wis.

Davenport Seed Co.

Davenport, Iowa

Hickox-Rumsey Co.

Batavia, N. Y.

Hunkel Co., G. H.

Milwaukee, Wis.

Hyde Co., H. A.

Watsonville, Calif.

Interstate Seed & Grain Co.

Fargo, N. D.

(See Adv. Index Page 178)

Mahaffey Co., The

Chicago, Ill.

May & Co., Inc., W. H.

Alexandria, Va.

Miller & Co., Albert

Chicago, Ill.

(See Adv. Index Page 178)

Myers & Scott

Van Buren, Ark.

Owensboro Seed & Plant Co.

Owensboro, Ky.

Philadelphia Seed Co.

Philadelphia, Pa.

(See Adv. Index Page 178)

Pinner & Co.

Suffolk, Va.

Portland Seed Co.

Portland, Ore.

Scarlett & Co., Wm. G.

Baltimore, Md.

Simmons Seed Co.

Moorhead, Minn.

Valker-Christensen Co.

Minot, N. Dak.

Van Antwerp's Seed Store

Mobile, Ala.

(See Adv. Index Page 178)

Washburn-Wilson Seed Co.

Moscow, Idaho

(See Adv. Index Page 178)

Woodruff & Sons, S. D.

New York, N. Y.

Woodruff & Sons, S. D.

Orange, Conn.

(See Adv. Index Page 178)

SEED CORN

Atlantic Seed Co., Inc.

Philadelphia, Pa.

Bernhard Seed Co., A.

Parkston, S. D.

Bomberger Seed Co.

Modesto, Calif.

Bowman Seed Co., The

Concordia, Kan.

(See Adv. Index Page 178)

Bruns Seed Co.

Sigourney, Iowa

Cashman Seed Co.

Owatonna, Minn.

Clark & Sons, C. S.

Wakeman, Ohio

(See Adv. Index Page 178)

Cochrane Seed Co., T. H.

Portage, Wis.

Coe Seed & Grain Co., D. O.

Topeka, Kan.

(See Adv. Index Page 178)

Comstock, Ferre & Co.

Wethersfield, Conn.

(See Adv. Index Page 178)

Corneli Seed Co.

St. Louis, Mo.

(See Adv. Index Page 178)

Council Bluffs Seed Co.

Council Bluffs, Iowa

Coy Seed Co., Inc., The C. Herbert

Valley, Neb.

(See Adv. Index Page 178)

Coy & Son, Chauncey P.

Waterloo, Neb.

(See page 107)

Crabbs, Reynolds, Taylor Co.

Crawfordsville, Ind.

Craver-Dickinson Seed Co.

Buffalo, N. Y.

Dacotah Seed Co.

Bismarck, N. D.

(See Adv. Index Page 178)

Dakota Improved Seed Co.

Mitchell, S. D.

Davenport Seed Co.

Davenport, Iowa

(See Adv. Index Page 178)

Davis Seed Co., E. C.

St. Peter, Minn.

Davis, Zack

Delaware, Ohio

Dickinson Co., Albert

Chicago, Ill.

Farmer Seed & Nursery Co.,

Faribault, Minn.

(See Adv. Index Page 178)

Fielding's Sons, Geo. F.

Manhattan, Kan.

Forrest Seed Co., Inc.

Cortland, N. Y.

(See Adv. Index Page 178)

Frederick Seed Co.

Aurora, Neb.

(See Adv. Index Page 178)

Gilmore, E. L. C.

Ashland, Neb.

Griswold Seed & Nursery Co.

Lincoln, Nebr.

(See Adv. Index Page 178)

Grossman & Son, W.

Petersburg, Va.

Gurney Seed & Nursery Co.

Yankton, S. D.

Healy Seed Co.

Belle Center, Ohio

Holbrook Grocery

Keene, N. H.

Interstate Seed & Grain Co.

Fargo, N. D.

(See Adv. Index Page 178)

Jameson Havenor Co.

St. Paul, Minn.

Johnson, Inc., J. Oliver

Chicago, Ill.

Kanuf & Tesch Co.

Chilton, Wis.

Keller & Sons, Geo.

Quincy, Ill.

Kelly Seed Company

Peoria, Ill.

King & Sons, H. C.

Battle Creek, Mich.

(See Adv. Index Page 178)

Klingsmith Seed Co., E. J.

New Augusta, Ind.

Landreth Seed Co., D.

Bristol, Pa.

(See Adv. Index Page 178)

Mangelsdorf Seed Co.

Atchison, Kan.

Marshall Seed Co.

Marshall, Mo.

May & Son, Inc., W. H.

Alexandria, Va.

Meinershagen Seed House

Higginsville, Mo.

Minneapolis Seed Co.

Minneapolis, Minn.

Minnesota Seed Co.

New Ulm, Minn.



Old Bill Spud Says:

"When it's seed potato satisfaction you want, Miller has the Goods, the Organization and the Service."

A full supply of all varieties, certified or non-certified, stored under modern conditions in our warehouses in nine states.

Expert supervision not only of grading but of the field inspections which are the basis of certification.

Quick shipment of straight or mixed cars or less than carlots from our transit warehouse.

And then a desire to serve you just a little better.

ALBERT MILLER & CO.

Carlot Potato Distributors
308 W. Washington St.
CHICAGO



EXCLUSIVE WHOLESALE SEED CORN GROWERS SINCE 1878

Sweet, Dent, Flint Ensilage and Pop-Corns

C. S. CLARK & SONS
Wakeman, Ohio

FOR OREGON GROWN

*Domestic Ryegrass — English Ryegrass
Hairy and Common Vetch — Red and Alsike Clover*

Write for contract and spot prices

W. A. VOLLSTEDT

TANGENT, OREGON

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Continued

SEED CORN—Continued

- Morris Grain & Seed Co.**
Morris, Ill.
 (See Adv. Index Page 178)
- Nishna Valley Seed Co.**
Shenandoah, Iowa
 (See Adv. Index Page 178)
- Northrup, King & Co.**
Minneapolis, Minn.
 (See Adv. Index Page 178)
- Oklahoma Improved Seed Co.**
Chickasha, Okla.
- Ozark Nursery & Seed Co.**
Nashville, Ark.
- O. & M. Seed Co.**
Green Springs, Ohio
 (See Adv. Index Page 178)
- Page Seed Co.**
Greene, N. Y.
 (See Adv. Index Page 178)
- Pedrick & Son, Geo. R.**
Pedricktown, N. J.
 (See Adv. Index Page 178)
- Peppard Seed Co., J. G.**
Kansas City, Mo.
 (See Adv. Index Page 178)
- Rice Seed Co., Jerome B.**
Cambridge, N. Y.
 (See Adv. Index Page 178)
- Richards & Sons, Ross V.**
North Manchester, Ind.
- Robinson Seed Co., J. C.**
Waterloo, Neb.
 (See Adv. Index Page 178)
- Rogers Bros. Seed Co.**
Chicago, Ill.
 (See Adv. Index Page 178)
- Russell-Heckle Seed Co.**
Memphis, Tenn.
- Saunders Seed Co.**
Tippecanoe City, Ohio
- Schell, Inc., Walter S.**
Harrisburg, Pa.
 (See Adv. Index Page 178)
- Schoorl, Adrian J.**
San Francisco, Calif.
- Sherman Seed Co., W. G.**
Riverton, Iowa
- Simmons Seed Co.**
Moorhead, Minn.
- Sioux City Seed Co.**
Sioux City, Iowa
 (See Adv. Index Page 178)
- Skromme Seed Co.**
Roland, Iowa
- Standard Seed Co.**
Des Moines, Iowa
- Steele, Briggs Seed Co., Ltd.**
Toronto, Canada
 (See Adv. Index Page 178)
- Stevens, Ltd., F. B.**
Chatham, Ontario, Canada
- Strayer Seed Farm**
Hudson, Iowa
- Tanguay, Ltd.**
Quebec, Canada
- Vance Bros.**
Tillsonburg, Ontario, Canada
- Vermillion Seed Co.**
Vermillion, S. D.
- Western Seed & Irrigation Co.**
Fremont, Neb.
 (See Adv. Index Page 178)
- White & Co., Ltd., H.**
Shelburne, Ontario, Canada
- Wood & Sons, T. W.**
Richmond, Va.
- Woodruff & Sons, S. D.**
Orange, Conn.
 (See Adv. Index Page 178)
- Young, George W.**
Owosso, Mich.

TREE SEEDS

- Amtorg Trading Corporation**
New York, N. Y.
 (See Adv. Index Page 178)
- Colorado Seed Co.**
Denver, Colo.
- Ellis, F. M.**
Griffin, Ga.
- Herbst Brothers**
(Agts. for T. Sakata & Co., Yokohama, Japan)
New York City
 (See Adv. Index Page 178)
- Katzenstein & Co., Otto**
Atlanta, Ga.
- Loewith, Inc., Julius**
New York City, N. Y.
- Manshu Nosan Shokai, Inc.**
Dairen, So. Manchuria, China
 (See Adv. Index Page 178)
- Morris & Snow Seed Co.**
Los Angeles, Calif.
- North Eastern Forestry Co.**
Cheshire, Conn.
- Rosebank Nursery Co.**
Huntsville, Ala.
- Schon, Ltd., Jacob S.**
Bruenn, Czechoslovakia

VEGETABLE ROOTS

- Corneli Seed Co.**
St. Louis, Mo.
 (See Adv. Index Page 178)
- Hyde Co., H. A.**
Watsonville, Cal.
- Ledden, Orol**
Sewell, N. J.
- Pedrick & Son, Geo. R.**
Pedricktown, N. J.
 (See Adv. Index Page 178)
- Riverview Farms**
Bridgeton, N. J.
- Shedaker & Son, B. D.**
Burlington, N. J.
 (See Adv. Index Page 178)
- Shinn, Warren**
Woodbury, N. J.

WILD RICE

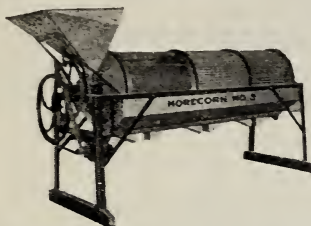
- Carpenter, Louis J.**
Bena, Minn.
- Fairbanks, B. L.**
White Earth, Minn.
- Fleming, Ernest**
Bena, Minn.
- Hamilton, Geo. D.**
Detroit, Minn.
- Hannah-Crawford, Inc.,**
Green Bay, Wis.
- MacGregor-Dennerly Co.**
Aitkin, Minn.
- Minnesota Wild Rice Co.**
La Porte, Minn.
- Scott, George,**
Ballclub, Minn.
- Terrell's Aquatic Farm**
Oshkosh, Wis.

BROKERS

- Amtorg Trading Corporation**
New York, N. Y.
 (See Adv. Index Page 178)
- Appel Commission Co., C. H.**
St. Louis, Mo.
 (See Adv. Index Page 178)
- Bernham, Inc.**
New York, N. Y.
- Crawford, Keen & Co.**
New York, N. Y.
- Duncan & Co., W. A.**
Kansas City, Mo.
- Dunn, Arthur G.**
New York City, N. Y.
- German, Gale T.**
New York, N. Y.

The Morecorn Sorter and Grader

selects a uniform grade of only the best developed and strongest germ kernels for seed. Insures accurate dropping with any planter, and increases both the quality and quantity of the yield.



Furnished in three sizes. Cut shows largest size, capacity 30 to 40 bushels per hour, and can be equipped for hand, belt or electric motor drive. Morecorn Sorters have been used throughout the Corn Belt for 20 years. Fully guaranteed subject to 10 days' trial. Write for detailed information and price.

Universal Hoist & Mfg. Co.

153 E. 14th Street
Cedar Falls, Iowa



**ALL
STANDARD
VARIETIES**
of Dents and Flints

**THE
REPEAT ORDER
KIND**

We are pleased to assure the trade that our Seed Corn is fully up to our high standard of quality of former years. When you order Seed Corn from us you get Seed that is all hand assorted, butted and tipped, and graded. You do not get Scoop Shovel Seed. We do not claim to sell the cheapest Seed Corn on the market, but do claim it to be as good as the best.

Buy Eastern Nebraska Grown Seed Corn

We grow corn strictly for Seed purpose.

Our corn is certified grown from Northern Stock in the Early Varieties from Wisconsin and Minnesota.

Large or late varieties are Eastern or Native stock.

Now contracting for 1929 delivery on named varieties.

EARLY

Wis. No. 12 or
Golden Glow
Silver King or
Wis. No. 7
Minnesota No. 13
N. W. Red Gold
Cap
Pride of the North
Early Murdock
Bloody Butcher
Minn. King
Ohio Improved
Leaming
Ohio White Cap
Yellow

LATE

Gold Mine
Silver Mine
Cattle Corn
Diamond Joe
Red Cob White
St. Charles
Kruks Yellow
Reids Yellow Dent
White Pearl
Boone County
White

Write for prices. We sell car lots only one or more varieties.
Book Your Seed Requirements NOW.

Frederick Seed Co.

Aurora

Nebraska

**Nishna Valley
Seed Co.**

**SHENANDOAH
IOWA**

BULBS, PLANTS AND MISCELLANEOUS SEEDS—Concluded

Brokers—Continued

Herbst Bros.

New York, N. Y.

(See Adv. Index Page 178)

Hershey Seed Co., Maxim

New York, N. Y.

Holst-Knudsen, S.

New York, N. Y.

Lecourt, Rene

Paris, France

Loewith, Inc., Julius

New York City, N. Y.

McCarty Co., The J. A.

Evansville, Ind.

McHutchison & Co.

New York, N. Y.

(See Adv. Index Page 178)

Mason, R. E.

San Francisco, Calif.

Payne, Avery F.

New York, N. Y.

Pincus, J. W.

New York, N. Y.

(See Adv. Index Page 178)

Purcell Seed Co.

Evansville, Ind.

Radwaner Seed Co., I. L.

New York, N. Y.

(See Adv. Index Page 178)

Skidelsky & Co., S. S.

New York, N. Y.

Smurthwaite, C. A.

Ogden, Utah

Sperco & Son, C. J.

New York, N. Y.

Steinhardt & Nordlinger

New York, N. Y.

Zahm & Co., J. F.

Toledo, Ohio

FORWARDING AGENTS

Furness, Withy & Co., Ltd.

New York City, N. Y.

Holst-Knudsen, S.

New York, N. Y.

Innes & Co., Ltd., W. G.

Finsbury Court, London, England

McHutchison & Co.

New York, N. Y.

(See Adv. Index Page 178)

Meadows & Co., Thos.

New York City, N. Y.

Pitt & Scott

New York, N. Y.

Rauand, A.

Paris, France

SEED COMMISSION FIRMS

American Seed Co.

Detroit, Mich.

Appel Commission Co., C. H.

St. Louis, Mo.

(See Adv. Index Page 178)

Benton Grain Co.

Kansas City, Mo.

Bernham, Inc.

New York, N. Y.

Flower Co., S. W.

Toledo, Ohio

Hulburd, Warren & Chandler

Chicago, Ill.

Innes & Co., Ltd., W. G.

Finsbury Court, London, England

King & Co., C. A.

Toledo, Ohio

Loewith, Inc., Julius

New York City, N. Y.

Picker & Beardsley Comm. Co.

St. Louis, Mo.

Pitt & Scott, Inc.

New York City, N. Y.

Pope & Eckhardt Co.

Chicago, Ill.

Radwaner Seed Co., I. L.

New York City, N. Y.

(See Adv. Index Page 178)

Sevin-Vincent Seed Co.

San Francisco, Calif.

Southworth & Co.

Toledo, Ohio

Stalknecht & Meyer

Copenhagen, Denmark

Steinhardt & Nordlinger

New York, N. Y.

Zahm & Co., J. F.

Toledo, Ohio

SEED STORAGE AND DISTRIBUTION

Blue Line Storage Co.

Des Moines, Iowa

Crooks Terminal Warehouse

Chicago, Ill.

(See Adv. Index Page 178)

Currier-Lee Warehouse Co.

Chicago, Ill.

Binyon-O'Keefe Fireproof Storage Co.

Ft. Worth, Texas

Houston, Texas

Bush Terminal Co.

New York City, N. Y.

Sevin-Vincent Seed Co.

San Francisco, Calif.

Patronize

those who made it
possible to publish
this Directory.

See Advertisers' Index on
Page 178

J. W. PINCUS

Broker

Grass and Field Seeds

Consulting Agriculturist

Room 1211
26 Cortlandt Street
New York City

Cable Address
SUCNIP—New York
Telephone Barclay 9379

Since 1875

Radway's

TESTED SEEDS

**"ALWAYS
DEPENDABLE"**

IMPORTERS OF BIRD SEEDS
ALSO

South Ger. Bent
Chewings Fescue N. Z.
Bent Stolons
Ky. Blue Grass—Red Top

Ask for sample offers.

I. L. RADWANER SEED CO., INC.
115 Broad Street New York

C. H. APPEL COMMISSION CO.

409 Merchants Exchange

St. Louis, Mo.

Specializing in country run Timothy and Red Clover,
Redtop, Cow Peas, Soy Beans, Sunflower, Seed
Corn, Sudan Grass, Millet

Send samples of your offerings. Send your inquiries when in the market.

UNEQUALED MODERN FACILITIES FOR

SEED STORAGE

IN TRANSIT

CROOKS TERMINAL WAREHOUSES

CHICAGO

New York Office: Transportation Bldg. KANSAS CITY
Advances Made

SUCCESS WITH INCUBATORS

THERE are four distinct factors that influence the successful operation of an incubator, viz.: the operating room, the machine, the eggs and the operator.

THE OPERATING ROOM

A well ventilated cellar or basement makes the best place in which to operate an incubator. Some cellars are poorly ventilated, however, being either too deep in the ground, too damp or possibly too dry—conditions far from ideal for hatching. In such cases a clean room in any part of the house or in an out building will be much better.

Choose a convenient place where the incubator will be undisturbed, where the sun will not shine on it at any time during the day, and where the ventilation can be readily controlled. Maintain a room temperature around 50 degrees. A heated room is not advisable except where the incubator temperature cannot be kept up without it in extremely cold weather. Heated air is not as moist and pure as it should be when it enters the egg chamber.

THE MACHINE

For convenience, incubators are generally classed as mammoth machines and small machines. The mammoth incubators run in sizes from 1,200 eggs to 10,000 or 20,000 egg capacity and higher. They are usually sectional in construction, heated by water with one coal-burning heater as the source of fuel. Gas or oil is used in some types and there are various distinctive features peculiar to the different makes of machines.

Small incubators range in size from 40 egg capacity up to 200, 300, 400 and even 600 and 800 capacity. They are divided into two classes, hot water machines and hot air machines. The hot water incubators depend upon the principle of radiation to distribute heat. A metal tank or pipe system, usually made of copper, is built in fixed position into the incubator and is filled with water heated by a lamp attached to the machine. The heat radiates to the eggs on the tray in the egg chamber, keeping them at the required temperature.

In the hot air type of incubator there are some variations in the exact principle of heating. In some makes, warm air is introduced into the egg chamber and diffuses over the eggs; in others, the heated air does not enter directly into the egg chamber, but is confined first to a metal tank from which heat radiates to the eggs, and in still others a combination is employed.

The source of heat is commonly an oil-

burning lamp. Electricity has also been found very satisfactory and there are some excellent electric machines now on the market.

Oil lamps are located differently in various makes of machines. In some, the lamp or heater is carried on the side, in others, under the machine at one end, and in still others, in the center beneath the egg chamber.

Incubators are manufactured in both round and rectangular shapes, each distinctive in design and obtainable in various sizes. Some are all-metal, some are metal covered over wood and others are all wood in construction. Another material used is pulp wall board.

Most manufacturers completely assemble the machine before it leaves the factory, the only exception being the legs, the lamp bracket and lamp, and the regulator. These are packed inside of the machine and the whole carefully crated for shipment.

In some instances, incubators are assembled only in part, shipped knocked-down flat and have to be put together by the dealer or his customers.

There are numerous makes of incubators on the market which give entire satisfaction when operated under proper conditions and when managed according to the explicit directions of the manufacturer. No incubator improperly located and poorly handled can be depended upon for a maximum hatch.

THE EGGS

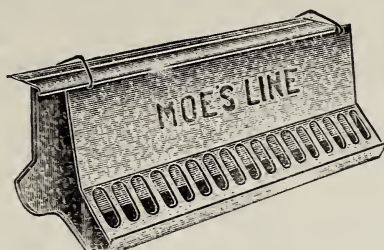
The character of the egg itself is an important factor in the selection of hatching eggs. Some eggs are too round and some too long to be used for hatching. Only eggs that are normal in shape and size should be classed as acceptable. Reject all irregular shapes, abnormally large or small sizes, rough shells, ringed or ridged shells and shells that are too porous.

Only eggs from strong, vigorous, healthy stock should be used. The operator should know something of the history of the parent stock—whether it is free from disease and whether it has been bred from good producing strains. That brings the danger of weak hatches down to a minimum. Many good hatching eggs, however, are spoiled through improper handling. An egg may be strong in fertility when laid and still fail to hatch through lack of good care prior to incubation. Eggs for hatching should be gathered every few hours, so as to prevent them from becoming either chilled

MOE'S POULTRY SUPPLIES



Star Fount
(For Mason Jars)



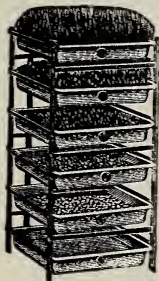
"Big Boy" Feeders



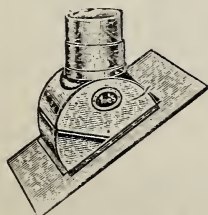
Chick Feeders



Grit Boxes



Oat Sprouter



Roof Saddle for
Brooder Houses

MOE'S LINE

Is a Complete and
Distinctive Line of

Good Poultry Equipment

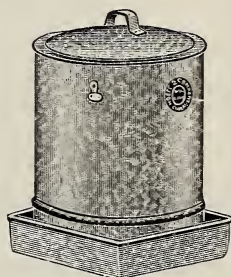
Moderate in Price and
Very Popular with the
Busy Poultry Man

Nothing Better Made

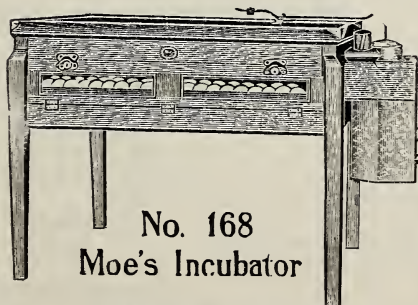
Write for Catalog, Prices
and Free Electros



Magazine Feeder
and Waterer

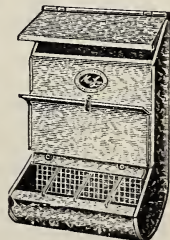


Famous Top-Fill
Fountain



No. 168
Moe's Incubator

Six Sizes—Hot Water Heat
Patent Egg Turning Trays
Automatic Regulation
Underwriters Label



Dry Mash
Hoppers

HOEFT & COMPANY
INCORPORATED

2311 Davis Street

North Chicago, Ill.

or heated. The one condition is as bad as the other. The growth and development of the germ will start at summer heat. Development will begin with only a few hours of heat. Then if the egg becomes chilled, growth of the germ is checked and it weakens and dies.

Eggs for hatching should be kept in a cool place at a temperature from 50 to 60 degrees. They should not be kept for long, however, as the fresher the eggs, the better they will hatch. A week to ten days should be the limit to be perfectly safe. Fertility weakens as the eggs become older. If eggs are to be kept more than a few days before incubation, it is well to turn them once or twice a day to keep the yolk from settling and sticking to the shell.

Eggs for hatching should not be subjected to rough handling. The constant vibration that results from improper packing of eggs for shipment, tends to weaken the germ to a degree that may prevent hatching.

THE OPERATOR

A good machine, properly located and

filled with strong, fertile eggs of normal size, is dependent upon the operator for a successful hatch. Too frequently the purchaser of an incubator overlooks or intentionally discards the printed directions of the manufacturer and proceeds to run the machine according to his own idea of operation. This is the most frequent cause of failure. Manufacturers have tested their machines in every possible way and the printed directions that go to the purchaser are the result of exhaustive experiments. Experts have handed down the rules of operation and it is rarely that they can be improved upon. This fact should be impressed upon the customer very strongly at the time the machine is purchased. Most complaints by customers against the up-to-date incubators of today can be traced to faulty operation.

All that is required of the operator is ordinary common sense combined with a determination to follow the manufacturer's directions to the letter. If this requirement is fulfilled there will be few complaints and far better hatches.

POULTRY DISEASES

By Earl M. Whitney

SOME of the common poultry diseases, their causes and symptoms are:

COLDS

Causes—Insanitary conditions, dampness and poor ventilation in poultry house. Contact with other birds so afflicted.

Symptoms—Coughing, sneezing, watery eyes and nostrils and general listless appearance.

Remedy—Eliminate the cause. Isolate sick birds. Use some good disinfectant in poultry house and treat fowls with a well-known cold remedy.

ROUP

Causes—Neglected colds; contact with other birds so afflicted; contact with germs of Roup which are frequently carried by one means or another to healthy, vigorous flocks. The roup germ is highly contagious.

Symptoms—Same as ordinary cold to begin with, followed rapidly by discharge from nostrils of mucus having very bad odor; also discharge from eyes which, if allowed to go without treatment, will cause swelling and closing; white patches and cheesy white growth in mouth which often becomes so bad as to prevent its closing. Cheeks swell up like mumps.

Remedy—Isolate sick birds and clean

and disinfect houses thoroughly, administering some good roup preventive to all exposed birds as well as those afflicted. Kill and burn all fowls in advanced stages of this dread disease if they do not respond to treatment. Wash face and eyes of birds with diluted disinfectant and remove all sticky substance. It is well also to dip the bird's head into this solution. As birds show signs of improvement, give them some good conditioning remedy that will serve as a tonic.

CHICKEN POX

Causes—Overcrowded, insanitary conditions, dampness, etc. Contact with other birds so afflicted. Germ very contagious and easily introduced into healthy flock by various ordinary means hard to prevent.

Symptoms—Pimples on comb and head which rapidly increase in size, becoming sores and ulcers and frequently attacking the eyelids to the extent of closing them and in neglected cases spreading to other parts of the body.

Remedy—Eliminate the cause, disinfecting house thoroughly and isolating afflicted birds. Apply good chicken pox remedy to both afflicted and exposed birds. Administer some good cathartic through the drinking water and add a reputable tonic or regulator to the mash feed.

Quisenberry's

GUARANTEED

POULTRY REMEDIES & MINERALS

Assure Dealers

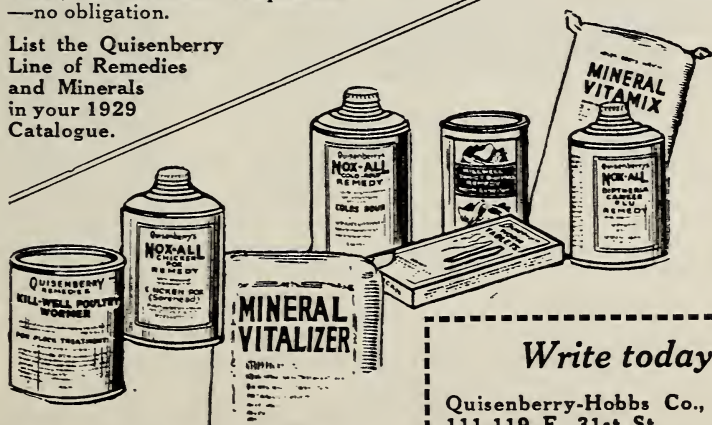
Greater Profits — Quicker Turnover

THE QUISENBERRY LINE

is complete — fills every demand for Poultry Remedies and Mineral Feeds. Manufactured and guaranteed by Prof. Quisenberry, recognized as one of the world's leading poultry authorities.

Complete system of sales co-operation and our local advertising over dealer's firm name doubles turnover with increased profits. We Guarantee Quisenberry Products—Free Poultry Service to dealer's customers. Have Prof. Quisenberry and his full staff of American Poultry School Experts diagnose and correct their poultry ailments—Saves dealer's time and makes you money. Send Today for Distributor Proposition —no obligation.

List the Quisenberry Line of Remedies and Minerals in your 1929 Catalogue.



QUISENBERRY-HOBBS COMPANY

113 S. E. 31ST STREET
Kansas City Missouri

Write today

Quisenberry-Hobbs Co.,
111-119 E. 31st St.,
Kansas City, Mo.

Explain Dealers' Proposition
with sales help and free service
to patrons.

Firm

Address

CANKER

Causes—Insanitary conditions, dampness in poultry house, moldy food, aftermath of other diseases which have left fowls in weakened condition from which canker develops. Just as sore eyes or deafness in children are frequently the outgrowth of measles.

Symptoms—Sores in mouth and throat which develop into ulcers and white patches. Frequently a swelling is caused as in roup.

Remedy—Eliminate cause if possible by thoroughly disinfecting poultry quarters. Isolate sick birds. Apply strong disinfectant directly to affected parts by swabbing out mouth and throat. Add tonic or regulator to the mash feed.

RHEUMATISM

Causes—Poor ventilation of houses resulting in dampness; undue exposure of birds to bad weather conditions.

Symptoms—Lameness; swollen joints; a stiffness in carriage that is unmistakable.

Remedy—Apply some good liniment made for this specific purpose. Improve living conditions of fowls; avoiding undue exposure to the elements and keeping them in the poultry house on rainy, damp days.

CROP BOUND

Symptoms—Swelling and souring of crop. Listlessness and lack of appetite.

Causes—Obstruction in crop such as hay or straw or other foreign substance. Eating sour food or indigestible matter of some sort.

Remedy—Massage crop frequently. If this has no effect, try to empty crop through the mouth. In the event this is of no avail, an operation is necessary. The crop is cut open, thoroughly cleaned and disinfected, sewed up and the bird is placed on a diet of mash feed in which is mixed a good tonic or regulator.

BUMBLEFOOT

Causes—Bruised condition of foot due to flying from one spot to another or jumping from roosts or nests to poultry house floor, the foot becoming sprained or injured by contact with stones, nails or other hard objects.

Symptoms—Lameness causing noticeable limp; swelling of soft part of foot which ultimately forms an abscess.

Remedy—When abscess has formed, pus should be removed and affected part thoroughly washed out with good disinfectant. A healing ointment should then be applied and the foot bound up so as to prevent any foreign substance from coming into contact with the wound until

it is healed. It is sometimes necessary to repeat this operation. Bird should be kept in cage or small coop where it will get rest and quiet until sore is healed.

CONSTIPATION

Causes—Lack of exercise; improper feeding.

Symptoms—Listlessness; indigestion; stoppage of bowel movement.

Remedy—Some good cathartic followed by closer attention to scientific feeding methods.

EGG BOUND

Cause—Disarrangement of egg organs, usually due to over-fat condition.

Symptoms—Continued unsuccessful efforts to lay.

Remedy—Except in severe cases, application of sweet oil through the vent and gentle massaging of the abdomen will release the egg. The fowl's grain diet should be lessened and the consumption of mash feed increased. Feed grain only to induce sufficient exercise to prevent overfat condition.

SCALY LEG

Cause—Insanitary house and surroundings which encourage growth of mites that attack the scales of the fowl's legs, resulting in rough, unsightly growth and swelling.

Symptoms—Swollen, rough, unsightly appearance of legs.

Remedy—Wash well with soap and water and apply scaly leg ointment to affected parts until condition clears up. Prompt action before scaly leg is allowed to develop to any great extent will eliminate this trouble in a few treatments.

WORMS

Causes—Insanitary food and living conditions.

Symptoms—General ill health along with seemingly good appetite.

Remedy—There are now worm emulsions on the market which are reported as relieving this condition. Until recently the treatment of worms in fowls has been a problem that presented great difficulty to leading poultry authorities.

WHITE DIARRHEA

Causes—Contagion or inheritance.

Symptoms—Listless, drooping, run-down appearance. Droppings white or creamy colored.

Remedy—In advanced stages, chicks should be killed and burned. Where there seems to be a chance of saving them, separate immediately from remainder of brood, disinfect everywhere as the disease is very contagious. Administer some well-known White Diarrhea preventive, following directions very carefully.

MODERN and BETTER

... Legume Inoculation ...



EXCLUSIVE FEATURES

- | | |
|-----------------------------|---|
| HARDY WORKERS | { farm bred, hardy bacteria; resistant forms that produce nodules on roots. |
| POSITIVE RESULTS | |
| MODERN SEED TREATING | { dry powder packing permits use with any seeding method; may be used with or without water; adheres to dry seed. |
| LONG LIFE | { McQueen process insures effectiveness under difficult conditions—such as: overseas shipment; unfavorable soil conditions; uncommon seeding methods. |

NATIONALLY ADVERTISED— FRIENDLY CO-OPERATION—
REAL SELLING HELPS— ATTRACTIVE DEALER PRICES—
—IT PAYS TO SELL McQUEEN'S—

THE McQUEEN BACTERIA CO.
 Baltic, Ohio



EDWARDS
LÉGUME BAK

Discounts yielding a nice profit to the dealer.

Dependable bacteria cultures for seed inoculation. Made by a Bacteriologist twenty years in the business.

Standard retail prices

THE EDWARDS LABORATORY, Lansing, Mich.

"The early worm gets the bird"

but

LONG'S EARLY BIRD POULTRY TONIC

"gets the worm"

The only **COD LIVER OIL TONIC** that controls Intestinal Worms
 Strongest Money-Back Guarantee Ever Written
 Quart, 75c prepaid; Gallon, \$2.50 prepaid; 6 Gal Case, \$2.00 per gal.
 F. O. B. Terre Haute

LONG EMULSION CO.

Desk 7, 110 No. 7th Street, Terre Haute, Ind.
 WRITE FOR ATTRACTIVE DEALERS' PROPOSITION.

INOCULATION OF LEGUMES

LEGUME inoculation is fast becoming a necessity wherever legume crops are grown, especially if planted for the first time on land not previously inoculated.

Commercial firms are manufacturing cultures for inoculating the different legume groups. These firms realize the necessity of producing good products and maintain laboratories which are operated by scientific men. State and government agencies welcome the commercial manufacture of inoculating cultures providing they are properly prepared.

This question of legume inoculation is of great importance to seedsmen, for the demand for inoculating cultures is constantly increasing, and the seedsmen is the proper agent for the distribution of these cultures. He sells the seeds and should urge upon his customers to buy inoculating cultures for the seeds that require inoculation to assure perfect stand.

There are a number of reputable companies that are manufacturing inoculating cultures. These firms employ chemists who have made this line of work a life-long study. Each culture for the different kinds of legumes is carefully prepared and when properly mixed with the seeds to be planted the desired inoculation results. These commercial cultures are inspected and tested from time to time by state and government officials, which tends to keep manufacturers careful as to the potency of their products. As a result of the painstaking manner in which these legume cultures are manufactured, some excellent cultures are now available.

Farmers are realizing more each year

that the use of these tested, artificial cultures is far more satisfactory than the old-fashioned soil inoculation method. They also feel that the use of these cultures always assures them of a good stand of any legume they happen to plant.

Agricultural colleges have for a number of years done some excellent educational work in getting the farmer to realize the importance of inoculation. They have not been alone in this educational work, for many of the manufacturers of inoculating cultures have spent much time and money in this educational campaign. There are few farmers who plant legumes that do not inoculate their seed.

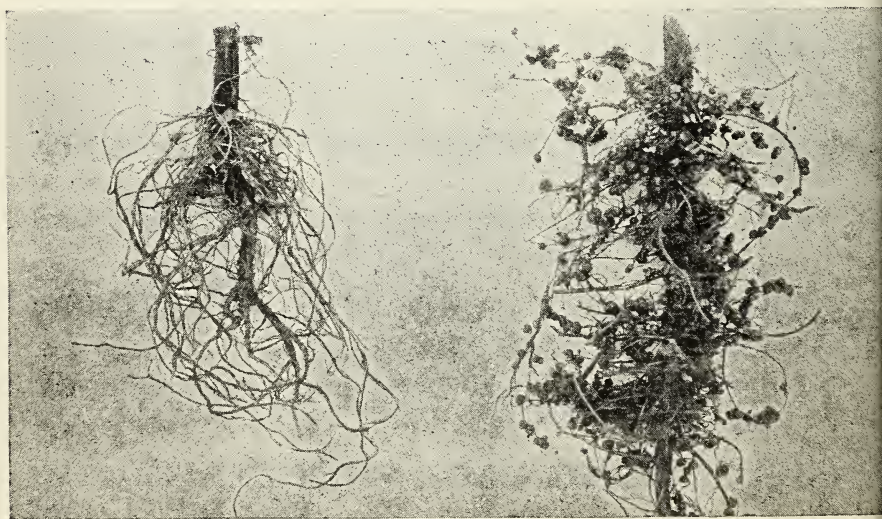
Seedsmen should handle a line of inoculating cultures which has been proven to be O.K. Manufacturers put up this material in attractive containers. Different cultures are required for different crops. These cultures are put up in packages of different sizes depending upon the amount of seed to be inoculated. The seed should be mixed with the culture. Specific directions are found on the different packages. When everything is considered, inoculating cultures is a most profitable line for seedsmen to handle and it undoubtedly will become more and more profitable when the value of inoculation is more universally known.

The following is copied from page 13 of "Farmers' Bulletin 315," from the U. S. Department of Agriculture:

"Inoculation (of legumes) is desirable—

(1) If the soil has not previously borne leguminous crops.

(Continued on page 120)



Left—Roots of Plant Not Inoculated. Right—Roots of Plant Inoculated, Showing Nodules.



The Stimuplant "line" now includes our own cultures for legume inoculation, under the brand name of STIMUGERM (both jelly and humus media)

Old friends in new clothes

THE personnel of the organization which for ten years has made and marketed Farmogerm and Humogerm, has now formed a new company. Our own cultures for legume inoculation are now being placed on the market under the name STIMUGERM, a sister product to the old well known STIMUPLANT (plant food) which we shall continue to market.

The same strong support which has been given Farmogerm and Humogerm since 1919 will be put behind STIMUGERM, by the same people. The highest type of laboratory skill, and business administration will insure the most pleasant relations with old customers and new, and the maintenance of highest standards.

A complete assortment of cartons, posters, descriptive leaflets, dealer price sheets and other materials, including electros for advertising use are now ready.

Stimuplant Laboratories

Long Island City, N. Y.

(Continued from page 118)

(2) If legumes previously grown on the same land were devoid of nodules.

(3) If the legumes to be sown belong to a species not closely related to one previously grown on the same soil.

(4) If the soil produces a weak growth of legumes, even though their roots show some nodules.

"It is significant of the relative value of pure culture inoculation that a high percentage of beneficial results is being obtained, not only where legumes new to the region are being tried, but where the ordinary legumes used in rotation have been inoculated, a phenomenon which is undoubtedly due to the increased virility of the nodule-forming bacteria resulting from the proper development of the pure cultures in the laboratory. It is also true that the crops following the inoculated legumes have in many cases shown gains not evident in the legume crop. The practice of inoculating is therefore justified where legumes are naturally inoculated, but do not seem to give their full vigor nor to give the best results as green manure."

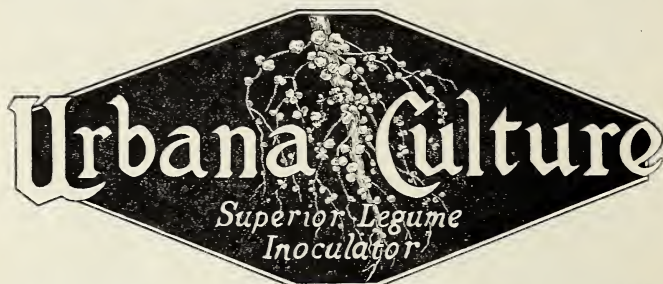
The following seeds require inoculation in order to assure a perfect stand: Red clover, alfalfa, sweet clover, alsike clover, white clover, crimson clover, bur clover, yellow trefoil, lespedeza, garden peas,

field peas, lentil, vetches, sweet peas, cowpeas, soybeans, garden beans, field beans, lima beans, velvet beans, peanuts, beggarweed, lupines, sainfoin and other legumes.

Legume crops are the most profitable ones planted by the farmer. They are soil builders and are used in every good crop rotation practiced by the farmer. In order to emphasize the value of legume crops the following table has been compiled which shows the relative feed value of legumes compared with some of the non-legume crops:

Digestible Nutriments in 100 Pounds

Name of Crop	Total Dry Matter in 100 lbs.	Crude Protein Lbs.	Carbo-hydrates Lbs.	Fat Lbs.
	Lbs.	Lbs.	Lbs.	Lbs.
Alfalfa, Hay	91.9	10.5	40.5	0.9
Clover, Alsike	90.3	8.4	39.7	1.1
Clover, Crimson	90.4	10.5	34.9	1.2
Clover, Red	84.7	7.1	37.8	1.8
Corn, Grain	89.4	7.8	66.8	4.3
Corn, Fodder	90.8	1.0	31.2	9.7
Cotton Seed Meal..	93.0	37.6	21.4	9.6
Cowpeas, Seed	85.4	16.8	54.9	1.1
Cowpeas, Hay	89.5	9.2	39.3	1.3
Oats, Grain	89.6	8.8	49.2	4.3
Oats, Hay	86.0	4.7	36.7	1.7
Peanuts, Shelled ...	92.5	25.1	13.7	35.6
Peanut Vine Hay...	92.4	6.7	42.2	3.0
Soybean, Seed	88.3	29.1	23.3	14.6
Soybeans, Hay	88.2	10.6	40.9	1.2
Sweet Potatoes	28.9	0.8	22.9	0.3
Vetch, Hairy, Hay...	88.7	11.9	40.7	1.6
Vetch & Oat Hay...	85.0	8.3	35.8	1.3
Velvet Beans	90.0	9.6	52.5	1.4



FOR ALFALFA, SWEET CLOVER, CLOVERS, SOYBEANS — ALL LEGUMES

Scientifically Prepared

on

Jelly Medium

by

Skilled Bacteriologists

Prices to Farmers

Alfalfa, Sweet Clover—Small Seeds

1 bu. size for 60 lbs. seed.....	\$0.50
2½ bu. size for 150 lbs. seed.....	1.00
½ bu. size for 30 lbs. seed.....	.35

Soy Beans, Cow Peas—Large Seeds

2 bu. size for 120 lbs. seed.....	\$0.50
5 bu. size for 300 lbs. seed.....	1.00
1 bu. size for 60 lbs. seed.....	.35

Made Right—Sold Right—Prompt Service

It will pay you to write us for full particulars

THE URBANA LABORATORIES



(1/25 Actual Size)

URBANA

::

ILLINOIS

NITRAGIN FOR ALFALFA—CLOVERS—PEAS—BEANS—VETCH—ALL LEGUMES



"Established in 1898"

The Original Soil Inoculator

PRESENTS ANOTHER WINNING FEATURE IN 1929

LEGUME GERM COUNT ON EVERY CAN

NITRAGIN leads again! Each and every NITRAGIN can will in 1929, in addition to the DATE and Price, contain the guaranteed scientific LEGUME GERM COUNT. Think of what that means.

The Germ Count gives the Seedsman a reliable standard—"a yardstick"—to measure inoculator propositions with—tells him at a glance how many legume germs he is buying per dollar invested—places inoculator purchases on a sound business basis.

IT'S THE NUMBER OF FRESH LEGUME GERMS THAT COUNT—NOT THE PRICE OR THE SIZE OF THE CONTAINER

For that reason NITRAGIN costs less than the cheapest inoculator in the market in like sizes, for NITRAGIN exceeds some by billions and others by millions of legume germs per container. Why not buy your inoculator like you buy seed—"so many" bacteria per bushel?

Millions of farmers are reading this message in their National and Local publications. Capitalize with us! This will be another NITRAGIN Year.

ALWAYS FIRST—NEVER FOLLOWS

1. **FIRST** Commercial Inoculator in the World, 1895.
2. **FIRST** Scientific Com. Inoculator in America, 1898.
3. **FIRST** To allow Dealer Exchange Privilege.
4. **FIRST** To be sold on Bushel basis.
5. **FIRST** To DATE Labels.
6. **FIRST** To place LEGUME GERM COUNT on every package.



Write us for Prices and Sales Plans.

NITRAGIN FOR ALFALFA—CLOVERS—PEAS—BEANS—VETCH—ALL LEGUMES

THE NITRAGIN COMPANY, INC.

Ninth and National Avenues

MILWAUKEE

WISCONSIN

**SAVES
TIME AND
MONEY**

**EARN
DOLLARS FOR
YOU**



BROWN BAG FILLING MACHINES

For Filling Seeds in Flat Packets
Solves "HELP" Problem

They do the work automatically—faster, neater and more accurately than by hand methods — prevent loss from waste — protect both you and your customer.

We manufacture a complete line of Return Envelopes, Seed Packets, Catalog Envelopes, Bag-Filling Machines for filling seeds in flat packets and Bag-Making machines. BROWN BAG FILLING MACHINES automatically fill flat packets with all varieties of seeds. Measure the seed. Fill the packet. Seal it tight. Require but one operator. Deliver 3,000 packets per hour. Reduce labor costs. Eliminate waste. Insure accuracy. Speed up orders.

Write Us

THE BROWN BAG FILLING MACHINE COMPANY
FITCHBURG **MASSACHUSETTS**

SPRAYING CALENDAR

This calendar is recommended from experience gathered by men connected with State Agricultural Experiment Stations and from other sources.

DISEASE OR INSECT	CURE	FIRST SPRAYING	SECOND SPRAYING	THIRD SPRAYING	FOURTH SPRAYING	REMARKS AND CAUTION
APPLE						
Codling Moth	Arsenates in Bordeaux or arsenate of lead 1 or 1½ lbs. to 50 gallons.	As soon as blossoms fall.	7 to 10 days later.	2 weeks later.	7 weeks later.	Later spraying, if made should be made with diluted solutions.
San Jose Scale	Lime-Sulphur.	Late in fall, late in winter or early in spring.				Use lime-sulphur only when trees are dormant.
Scab	Lime-Sulphur.	Just before blossoms open.	Within a week after blossoms have dropped.	Same 7 to 10 days later.	Repeat 10 to 14 days later.	The spray just before blossoms open is very essential for scab.
Woolly Aphis	Nicotine Sulphate ½ pint to 50 gallons of water.	When leaf-buds are showing tip green.				Don't use strong emulsion when trees are in full leaf.

ASPARAGUS

Asparagus Rust	Bordeaux.					Plant healthy roots of resistant varieties.
----------------	-----------	--	--	--	--	---

BEAN

Anthraxnose	Bordeaux.	While original seed parts are still on seedlings.	10 days later.			
-------------	-----------	---	----------------	--	--	--

CABBAGE AND CAULIFLOWER

Cabbage Worm	Arsenate of lead 1 lb. to 50 gallons of water.	With first appearance of worm.	Whenever worms are observed.	Same.	Same.	Force spray into center of plants.
--------------	--	--------------------------------	------------------------------	-------	-------	------------------------------------

CHERRY

Rot	Lime-Sulphur.	Before blossoming.	After blossoming.	2 weeks later.	2 weeks later.	
Curculie	Arsenate of lead in Bordeaux.	Before blossoming.	As blossoms dry up.	1 week later.		Avoid strong solutions.

CUCUMBER

Cucumber Beetle	Powdered Arsenate of lead or Calcium Arsenate.	Soon as plants appear.	Week later.	Week after second.	Week after third.	
-----------------	--	------------------------	-------------	--------------------	-------------------	--

CURRANT

San Jose Scale	Lime-Sulphur.	Same as apple.				
Worm	Arsenate of lead.	When worms first appear.	Repeat in 3 or 4 days.	Repeat as second.		Look for worms on under side of leaf.

GOOSEBERRY

Mildew	Lime-Sulphur.	Before blossoms open.	After blossoming.	10 days later.	10 days later.	
Worm	Arsenate of lead.	When worms first appear.	Repeat in 3 or 4 days.			

GRAPE

Anthraxnose	Bordeaux.	Just before buds open.	Just before blossoming.	Just after fruit has set.	Ten days later. Bordeaux.	
Black Rot and Powdery Mildew	Bordeaux.	Just before blossoming.	Just after fall of blossoms.	Seven to 10 days later.	Seven to 10 days later.	

(Spraying table continued on page 124)

SPRAYING CALENDAR, Continued

This calendar is recommended from experience gathered by men connected with State Agricultural Experiment Stations and from other sources.

DISEASE OR INSECT	CURE	FIRST SPRAYING	SECOND SPRAYING	THIRD SPRAYING	FOURTH SPRAYING	REMARKS AND CAUTION
PEAR						
Scab	L i m e-Sul-phur.	When leaves are half grown.	Just before the flower buds open.	After blossoms drop.		
Codling Moth	Arsenates i n Bordeaux.	As with Apple.				
San Jose Scale	L i m e-Sul-phur.	In fall or early spring.				See Apple.

PLUM

Rot	L i m e-Sul-phur.	As buds are swelling.	Just after blossoms fall.	Three or 4 weeks later.	As fruit begins to color.	Repeat every 7 or 10 days.
Curculio	Arsenate o f lead i n Bordeaux.	With starting of buds.	Just after blossoms fall.	Five days later.		Jar, gather and destroy curculios and stung plums.
San Jose Scale	L i m e-Sul-phur.	In late fall or early spring.				

PEACH

Leaf Curl	L i m e-Sul-phur.	In fall or spring.	As buds are opening.	Just after calyxes drop.	Not required if others are well done.	
Rot and Scab	L i m e-Sul-phur.	As buds are swelling.	Three or 4 weeks after fall of blossoms.	Two or 3 weeks later.	Repeat.	Destroy all mummies.
Bud Moth	Arsenate i n Bordeaux.	With opening of buds.				Use only half usual amount of poison.
San Jose Scale	L i m e-Sul-phur.	In late fall or early spring.				See Apple.

POTATO

Early Blight	Bordeaux.	When plants are 6 inches high.	Two weeks later.	Two weeks later.	Two weeks later.	Apply until five applications have been made.
Late Blight	Same.	Same.	Same.	Same.	Same.	
Scab	Soak seed in Corrosive Sub-limate.		Solution (2 oz. in 16 gallons of water).			
Potato Bugs	Arsenate of lead or Paris Green.	When beetles or young appear.	As soon as bugs appear.			Arsenate of lead. 3 lbs. to 50 gals. of water for Potato Bugs alone.

QUINCE

Fruit and Leaf Spot	L i m e-Sul-phur.	Just before blossoms open.	After blossoms drop.	Two weeks later.	Two weeks later.	
San Jose Scale	L i m e-Sul-phur.	In late fall or early spring.				See Apple.

STRAWBERRY

Leaf Spot	Bordeaux.	Before blossoms open.	2 or 3 weeks later.			Mow off tops and burn, soon as fruit is picked.
-----------	-----------	-----------------------	---------------------	--	--	---

TOMATO

Anthraxnose	Bordeaux.	Soon after fruit sets.	3 weeks later.	3 weeks later.		
Leaf Spot	Bordeaux.	At transplanting time.	2 weeks later.	2 weeks later.	2 weeks later.	

WATERMELON AND MUSKMELON

Anthraxnose and Leaf Spot	Bordeaux.	When plants begin to vine.	2 or 3 weeks later.	2 or 3 weeks later.	2 or 3 weeks later.	The intervals from last spraying is 2 weeks for muskmelons and 3 weeks for watermelons.
---------------------------	-----------	----------------------------	---------------------	---------------------	---------------------	---



MYERS SPRAY PUMPS

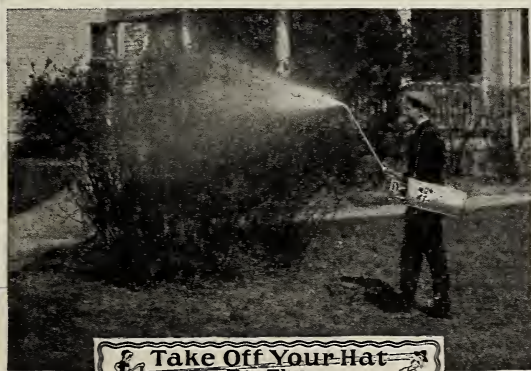
A Style for Every Service

The tendency of spray pump design is toward greater efficiency and better results. Spray pumps of yesterday will not answer for the standards of today. To spray for profit now means scientific spraying, and scientific spraying whether on a large or small scale involves speed, thoroughness, economy and labor reduction to which must be added dependability of equipment.

The splendid record of Myers Spray Pumps in every field of the spraying world stands today as our best testimonial for them, and accounts in no small measure for their selection and use by leading orchardists, seedsmen, nurserymen, gardeners and farmers of this and of many other lands.

The Myers Line of Spray Pumps is complete and proven—a style and size for any service—with sought after features which both you and your customers will appreciate for their real worth.

Write or wire for catalog and prices.



Take Off Your Hat
To The
MYERS
PUMPS • WATER SYSTEMS • HAY TOOLS • DOOR HANGERS

THE F. E. MYERS & BRO. CO.

No. ORANGE ST. ASHLAND, OHIO

For Lawns-Gardens-Golf Courses

PREMIER BRAND

PULVERIZED POULTRY MANURE

Guaranteed Analysis

Nitrogen	49%
Ammonia	600%
Available Phosphoric Acid	250%
Total Phosphoric Acid	275%
Potash	130%

Manufactured by
**PREMIER POULTRY MANURE
COMPANY**

308 W. Washington St.
Chicago, Ill.

**A PROFITABLE SIDELINE
FOR
CATALOG AND
COUNTER TRADE**

WRITE US FOR DEALER PROPOSITION
Premier Poultry Manure Co.
CHICAGO

We Have an Attractive 1929 Dealer's

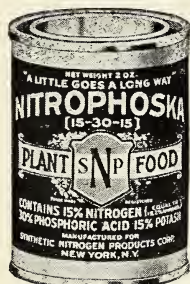
PROPOSITION

on

NITROPHOSKA

and

FLORANID (Urea)



**We Assist
Dealers
with
Advertisements
in
Their
LOCAL PAPERS**

These two plant foods have gained deserved popularity because they make good in customer's soil. Every dealer who handles them gets repeat demands after a customer is once started. Our 1929 Proposition works with each dealer in his own trading area helping him move the goods through advertisements over his own name in his local papers.

Write for details about our special dealers assortments
—the profit is generous.

SYNTHETIC NITROGEN PRODUCTS CORP.

Garden Department

285-G MADISON AVENUE

NEW YORK

6 Good Reasons Why Leading Seedsmen Sell VIGORO

Dependable in Its Results—Scientifically balanced and complete, Vigoro produces maximum results—Swift & Company's name on the package is your assurance of highest quality.

A Wide Market—Every one of your customers is a prospect for at least 100 lbs. Figure what this means to you in dollars and cents.

Profitable—Directly and Indirectly—A good direct profit on each sale—also an indirect profit. Since it assures the maximum productivity of your seeds, it makes better satisfied customers for you. This indirect profit alone is worth considerable to your business.

Nationally Advertised—Never before has any plantfood concern ever attempted an advertising campaign such as will back your efforts on Vigoro in 1929. National advertising in the best publications—large space advertising in metropolitan papers—all telling the Vigoro story to your customers in every part of the country.

Convenient to Stock—Packed in heavy, white, paper-lined, cotton bags—attractively printed—convenient sizes—clean and odorless—compact packages requiring the minimum storage space.

Effective Sales Aids—Window trims in full color, attractive pamphlets, store cards, electrotypes, and stickers—movie slides—all furnished free to help you capitalize on this tremendous campaign.

Swift & Company
Chicago, Ill.

VIGORO



**Complete
Plant Food**

Endorsed by Leading Landscape Gardeners and Nurserymen

SIDE LINE MERCHANDISE

FERTILIZERS AND SPREADERS

FERTILIZERS

American Limestone Co.
Knoxville, Tenn.
Armour Fertilizer Wks.
Chicago, Ill.
Atlanta Chemical Co.
Atlanta, Ga.
Barrett Co., The
New York City, N. Y.
Bon Arbor Chemical Co.
Paterson, N. J.
Bramley & Son
Cleveland, Ohio
Central City Fertilizer Works
Central City, Iowa
Cincinnati Plant Food Co.
Cincinnati, Ohio
Darling & Co.
Chicago, Ill.
Empire Carbon Works
St. Louis, Mo.
Federal Chemical Co.
Columbia, Tenn.
Fertall Co.
Newark, N. J.
Fidelity Chemical Corp.
Houston, Texas
Flower City Plant Food Co., Inc.
Rochester, N. Y.
Friedman Tobacco Products Corp.
York, Pa.
Fujiya Fertilizer & Seed Co.
Moneta, Calif.
Grasselli Chemical Co., The
Cleveland, Ohio
Jones Phosphate Co., Robert
Nashville, Tenn.
Magnesia Products Co.
Milwaukee, Wis.
National Plant Food Co.
Eau Claire, Wis.
Natural Guano Co.
Aurora, Ill.
(See Adv. Index Page 178)
Ober & Sons Co., F.
Baltimore, Md.
Pacific Manure & Fertilizer Co.
San Francisco, Calif.
(See Adv. Index Page 178)
Parmenter & Polsey Fertilizer Co.
Boston, Mass.
Plant Products Co.
Baltimore, Md.
(See Adv. Index Page 178)
Potash-Marl, Inc.
New York City, N. Y.
Premier Poultry Manure Co.
Chicago, Ill.
(See Adv. Index Page 178)
Pulverized Manure Co.
Chicago, Ill.
(See Adv. Index Page 178)
Read Phosphate Co.
Nashville, Tenn.

Reading Bone Fertilizer Co.
Reading, Pa.
Reading Chemical Co.
Reading, Pa.
Robin Jones Phosphate Co.
Nashville, Tenn.
Royster Guano Co., F. S.
Norfolk, Va.
Ruhm Phosphate & Chemical Co.
Mt. Pleasant, Tenn.
Sanderson Fertilizer & Chemical Co.
New Haven, Conn.
Smith Agricultural Chemical Co.
Columbus, Ohio
Sodus Humus Co.
Benton Harbor, Mich.
Stadler Products Co.
Cleveland, Ohio
Stevens Chemical Manure Co.
London, England
Stimulant Laboratories, Inc.
Long Island City, N. Y.
(See Adv. Index Page 178)
Swift & Co.
Chicago, Ill.
(See Adv. Index Page 178)
Synthetic Nitrogen Products Corp.
New York City, N. Y.
(See Adv. Index Page 178)
Thompson & Sons, Ltd., Wm.
Clevesford, Scotland
Tipulite Co.
Darlington, England
Uniform Products Co.
Lancaster, Pa.
Virginia-Carolina Chemical Co.
Richmond, Va.
(See Adv. Index Page 178)
Williamson, Garfield
New York, N. Y.
Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)
Wilson & Co.
Chicago, Ill.
York Chemical Works
York, Pa.

FERTILIZER SPREADERS

Baier Bros. Mfg. Co.
Cissna Park, Ill.
Bateman Co., Fred H.
Philadelphia, Pa.
Browning, George William
Clinton, N. Y.
Crown Mfg. Co.
Phelps, N. Y.
Emerson-Brantingham Implement Co.
Rockford, Ill.
Iron King Imp. Co.
Madison, Ohio
Peerless Fertilizer Distributor Co., The
Cedar Rapids, Iowa
Southland Seed Co.
Orlando, Fla.

GARDEN AND FIELD IMPLEMENTS AND SUPPLIES

CULTIVATORS

Acme Cultivator Co.
Salem, Ohio
Akron Cultivator Co.
Akron, Ohio
Allen & Co., Inc., S. L.
Philadelphia, Pa.

American Fork & Hoe Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Bacon Mfg. Co.
Pontiac, Mich.
Bateman Co., Fred H.
Philadelphia, Pa.

WIZARD Sheep Manure

TRADE BRAND MARK



We can supply Wizard Brand Pulverized and Shredded Cow Manures.

Superior Quality

For years Wizard has been conceded the standard of quality by the dealer trade. It is concentrated by a special direct heat process that kills all weed seeds. It is bone dry and packed in new, strong bags that reach your customers in perfect shape.

Dealer Service

A quick seller because it has been consistently advertised for twenty years. The free sales and advertising service to dealers insures increased sales and profits. It pays to handle this widely known, quick selling brand.

Wizard Sheep Manure is packed in 2, 5, 10, 25, 50 and 100-pound bags. Send for dealers proposition!

The Pulverized Manure Co.

395 Union Stock Yards, Chicago



"I need three things to sell fertilizer in my community."

"What are they?"

"Package—Product—Price"

"We Have Them!"

SHEEP'S HEAD PACKAGE

is perfectly adapted to its purpose—attractive, symmetrical, artistic, strong. Bears directions for use of product, and analysis of content.

2-pounds, 5-pounds, 10-pounds

Sheep's Head Pulverized Sheep Manure

contains in balanced ration the natural ingredients necessary to build up lawns, plants, flowers, shrubs, nursery stock. Its use can not be harmful to plant life. It is the perfect plant food.

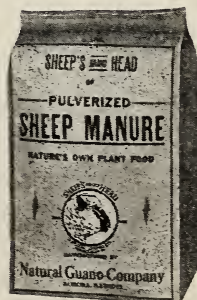
Sheep's Head Price enables you to buy and sell at a splendid profit, a product which gives marvelous value.

Inquiries Cordially Invited

NATURAL GUANO COMPANY
Aurora, Illinois

Established 1903

Manufacturers also of Shredded Cattle Manure in 100-lb. Bags



GARDEN AND FIELD IMPLEMENTS AND SUPPLIES—Continued

Cultivators—Continued

New Beeman Garden Tractor Co., The
Minneapolis, Minn.
Brinkly Hardy Co.
Louisville, Ky.
Brown Mfg. Co.
Zanesville, Ohio
Bruner Mfg. Co.
Ferndale, Mich.
Buffum Tool Co.
Louisiana, Mo.
Case Threshing Machine Co., J. I.
Racine, Wis.
Emerson-Brattingham Implement Co.
Rockford, Ill.
Empire Plow Co.
Cleveland, Ohio
Geyer Mfg. Co.
Rock Falls, Ill.
Gilson Co., J. E.
Port Washington, Wis.
Gilson Mfg. Co.
Port Washington, Wis.
Gravely Motor Plow & Cultivator Co.
Dunbar, W. Va.
Hayes Pump & Planter Co.
Galva, Ill.
Hudson Mfg. Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Iron King Imp. Co.
Madison, Ohio
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Leroy Plow Co.
Leroy, N. Y.
Letz Mfg. Co.
Crown Point, Ind.
Motor Macultivator Co.
Toledo, Ohio
Norcross & Sons, C. S.
Bushnell, Ill.
Ohio Cultivator Co.
Bellevue, Ohio
Red-E. Mfg. Co.
Milwaukee, Wis.
Schaible Mfg. Co.
Elyria, Ohio
Scott Co., I. W.
Pittsburgh, Pa.
Shaw Mfg. Co.
Galesburg, Kans.
Standard Garden Tool Co.
Montrose, Iowa
Ulrich Mfg. Co.
Rock Falls, Ill.
Utilitor Co., The
Indianapolis, Ind.
Wilbern Shared Forge Co.
Rock Falls, Ill.

FANNING MILLS

Burch Corp.
Crestline, Ohio
Cleland Mfg. Co.
Minneapolis, Minn.
Dickey Mfg. Co., A. B.
Racine, Wis.
Ferrell & Co., A. T.
Saginaw, Mich.
Newkirk & Newkirk
Rushville, Ind.
Owens Co., J. L.
Minneapolis, Minn.

DRILLS

American Fork & Hoe Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Bateman Co., Fred H.
Philadelphia, Pa.
Benthall Machine Co.
Suffolk, Va.

Crown Mfg. Co.
Phelps, N. Y.
Hayes Pump & Planter Co.
Galva, Ill.
Iron King Imp. Co.
Madison, Ohio
Letz Mfg. Co.
Crown Point, Ind.
Standard Garden Tool Co.
Montrose, Iowa

GARDEN HOSE

(See page 140)

GARDEN TRACTORS

American Farm Machine Co.
Minneapolis, Minn.
Dee & Ess Corp.
Cassadaga, N. Y.
(See Adv. Index Page 178)
Gilson Mfg. Co.
Port Washington, Wis.
Gravely Motor Plow & Cultivator Co.
Dunbar, W. Va.
Leroy Plow Co.
Leroy, N. Y.
Montague Mfg. Co.
Grand Rapids, Mich.
Northern Seed & Tractor Co.
Pittsburgh, Pa.
New Beeman Tractor Co., The
Minneapolis, Minn.
Pioneer Mfg. Co.
Milwaukee, Wis.
Shaw Mfg. Co.
Galesburg, Kans.
Standard Engine Co.
Minneapolis, Minn.
Utilitor Co., The
Indianapolis, Ind.

GRINDERS—HAND

Arcade Mfg. Co.
Freeport, Ill.
Letz Mfg. Co.
Crown Point, Ind.
Red Chief Mfg. Co.
Louisville, Ky.
Sanders Mfg. Co., J. M.
Atlanta, Ga.

HARROWS

Henderson & Co., Peter
New York, N. Y.
(See Adv. Index Page 178)

HOES

American Fork & Hoe Company
Cleveland, Ohio
(See Adv. Index Page 178)
Bateman Co., Fred H.
Philadelphia, Pa.
Geyer Mfg. Co.
Rock Falls, Ill.
Gilson Co., J. E.
Port Washington, Wis.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Piqua Handle Mfg. Co.
Piqua, Ohio
Reichard Mfg. Co., F. B.
Bangor, Pa.
Schoener Mfg. Co.
St. Cloud, Minn.

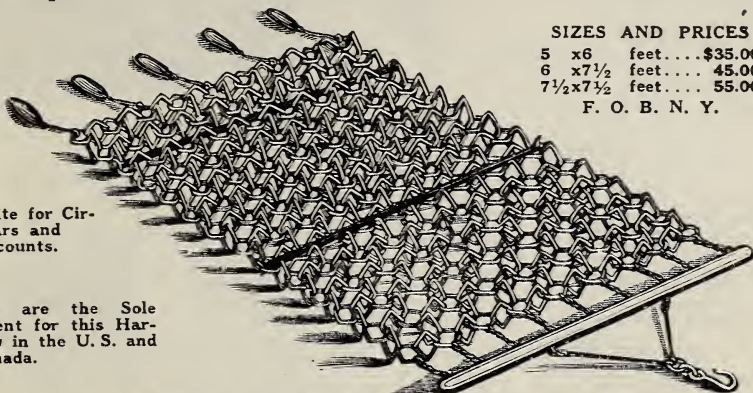
HORTICULTURAL TOOLS

Alliance Mfg. Co., The
Alliance, Ohio
American Fork & Hoe Co.
Cleveland, Ohio
(See Adv. Index Page 178)

Profitable Item for Seed and Implement Dealers Imported Scotch Chain Harrow

Smooths the Surface of the Earth

It is better than any other harrow. Always in demand by Gardeners, Farmers, Landscape Engineers, Contractors, Athletic Field Groundsmen and Greenkeepers.



SIZES AND PRICES

5	x6	feet....	\$35.00
6	x7½	feet....	45.00
7½	x7½	feet....	55.00

F. O. B. N. Y.

Write for Circulars and Discounts.

We are the Sole Agent for this Harrow in the U. S. and Canada.

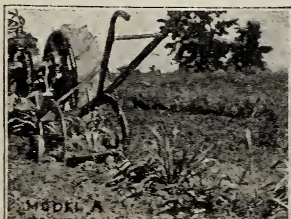
PETER HENDERSON & CO.

35-37 Cortlandt St., New York, N. Y.

WE LIFT THE WORLD WITH DEE and DEE LIFTERS

Harvest your Bulbs, Celery, Root Stocks, Nursery Stock, Onion Sets with a Dee & Dee. Unsurpassed for mulching.

Model A for Horses or any Tractor	\$42.50
Model B for Centaur Tractor.....	21.50
Model C for Beeman Midwest, Midwest-Utilitor, Red-E and Du-All Tractor	19.50
Model F for Bolens Du-All Tractor	15.00



SATISFACTION GUARANTEED

DEE AND ESS COMPANY
CASSADAGA, NEW YORK

Bartlett Pruning Tools

Have a
World Wide
Reputation



Most seed houses know the value of a good line of Pruning Tools and those who have stocked the BARTLETT No. 1 Compound Lever Tree Trimmer, Jointed Pole, or one-piece pole, and No. 777 Two Hand Pruner need no further inducements. They are sold. If you have never seen these splendid tools let us fill your sample order, at least send for catalog. Our tools are displayed in many of the seed catalogs now published.

BARTLETT MFG. COMPANY
407 E. Lafayette Ave.

Detroit, Mich.

GARDEN AND FIELD IMPLEMENTS AND SUPPLIES—Continued

Horticultural Tools—Continued

Bartlett Mfg. Co.
Detroit, Mich.
 (See Adv. Index Page 178)
Clyde Cutlery Co.
 Clyde, Ohio
Disston & Sons
 Philadelphia, Pa.
Hardie Mfg. Co.
 Hudson, Mich.
Iron King Imp. Co.
 Madison, Ohio
Leonard & Son, A. M.
Piqua, Ohio
 (See Adv. Index Page 178)
McKinney Mfg. Co.
 Pittsburgh, Pa.
Peck, Stow & Wilcox Co.
 Southington, Conn.

PLANT PROTECTORS

Calkins Machine Co.
 Spokane, Wash.
Germain Seed & Plant Co.
Los Angeles, Calif.
 (See Adv. Index Page 178)
Harris Mfg. Co., A. W.
 Sleepy Eye, Minn.
Plant Protector Co.
 Rochester, N. Y.

PLANT SETTERS

Masters Planter Co.
 Chicago, Ill.
Nagley Mfg. Co.
 Lyons, N. Y.
Ohio Rake Co.
 Dayton, Ohio
Potato Implement Co.
 Traverse City, Mich.
Wabers Mfg. Co.
 Racine, Wis.

PLANT SUPPORTS

Harris Mfg. Co., A. W. (Bands)
 Sleepy Eye, Minn.
Henry & Lee
 New York, N. Y.
Igoe Bros.
 Brooklyn, N. Y.
Leadclad Wire Co.
 Moundsville, W. Va.
McHutchison & Co.
New York, N. Y.
 (See Adv. Index Page 178)
Oriole Shop, The
 LaGrange, Ill.
Peerless Plant Stake Co., The
 Waterloo, Iowa
Unadilla Silo Co.
 Unadilla, N. Y.
United Steel & Wire Co.
 Battle Creek, Mich.
Vaughan's Seed Store
 Chicago, Ill.
Woodcraft Co., The
 Dalton, N. Y.

PLANTERS

Allen & Co., Inc., S. L.
 Philadelphia, Pa.
Iron King Implement Co.
 Madison, Ohio
Wright Planters Co., The
 Spokane, Wash.

PRUNING IMPLEMENTS

Alliance Mfg. Co., The
 Alliance, Ohio
Bartlett Mfg. Co.
Detroit, Mich.
 (See Adv. Index Page 178)

Cronk & Carrier Mfg. Co.
 Montour Falls, N. Y.
Disston & Sons, Inc., Henry
 Philadelphia, Pa.
Graham Co., Inc., John H.
 New York, N. Y.
Nagley Mfg. Co.
 Lyons, N. Y.
Northwest Fence & Wire Works
 Portland, Ore.
Peck, Stow & Wilcox Co.
 Southington, Conn.
Rhodes Mfg. Co.
 Grand Rapids, Mich.
Seymour Smith & Son, Inc.
 Oakville, Conn.
Trenton Patent Mfg. Co.
 Trenton, N. J.
Wiss & Sons, J.
 Newark, N. J.

RAKES

Bateman Co., Fred H.
 Philadelphia, Pa.
Cronk & Carrier Mfg. Co.
 Montour Falls, N. Y.
Leonard & Son, A. M.
Piqua, Ohio
 (See Adv. Index Page 178)
Ohio Rake Co.
 Dayton, Ohio
Piqua Handle Mfg. Co.
 Piqua, Ohio
Swineford Co., G. A.
 Canton, Ohio

SEED THRESHERS

Caledonia Bean Harvester Works
 Caledonia, N. Y.
Case Threshing Machine Co., J. I.
 Racine, Wis.
Gray's Sons, Inc., A. W.
 Poultney, Vt.
International Harvester Co.
 Chicago, Ill.
Koger Pea & Bean Thresher Co.
 Morristown, Tenn.
Owens Co., J. L.
 Minneapolis, Minn.

SEEDERS—DRILL

Bacon Mfg. Co.
 Pontiac, Mich.
Hudson Mfg. Co.
Minneapolis, Minn.
 (See Adv. Index Page 178)

SEEDERS—BROADCAST

Bateman Co., Fred H.
 Philadelphia, Pa.
Bohr, W. H.
 Westphalia, Mich.
Crown Mfg. Co.
 Phelps, N. Y.
Cyclone Seeder Co.
 Urbana, Ind.
Gaunt & Son, Inc., J. R.
 New York, N. Y.
Gilson Mfg. Co.
 Port Washington, Wis.
Goodell Co.
 Antrim, N. H.
Letz Mfg. Co.
 Crown Point, Ind.
Pratt Mfg. Co., Wm. E.
 Chicago, Ill.
Star Seeder Co.
 Shortsville, N. Y.
Urbana Seeder Co.
 Urbana, Ind.

Germāco
Hotkaps

The National Plant Protector
the best side line for the seeds-
man. Write for descriptive
pamphlet and sample.

GERMAINS
HOT KAP MFG. DIVISION
741-747 Terminal St.
Los Angeles, Calif.



MOISTURE TESTER

MADE ACCORDING TO GOVERN-
MENT SPECIFICATIONS FOR
SEED AND GRAIN

Write for Catalogue

SEED TRADE REPORTING BUREAU

1018 South Wabash Avenue

CHICAGO, ILL.

VOLCK

For Greenhouse and Garden Pests

Scientific pest control. A distinct im-
provement over old-type insecticides.
Highly effective against insect pests.
Wide margin of safety for tender plants.
Does not irritate the skin or smart the
eyes. Easy and pleasant to use. Send
the coupon for sample can and full in-
formation.

California Spray-Chemical Co.,
204 Franklin St., New York City

Send a sample can of VOLCK together with your
money-making proposition for dealers.

Name

Address



GARDEN AND FIELD IMPLEMENTS AND SUPPLIES—Concluded

SHOVELS

- Conneaut Shovel Co.
Conneaut, Ohio
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Wood Shovel & Tool Co.
Piqua, Ohio

SICKLES

- Leonard & Son, A. M.**
Piqua, Ohio
(See Adv. Index Page 178)
Simmons Hardware Co.
St. Louis, Mo.

SMUT TREATING MACHINES

- Cleland Mfg. Co.
Minneapolis, Minn.
Howes Co., S.
Silver Creek, N. Y.
Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)

SOIL SHREDDERS

- Kemp Mfg. Co.
Erie, Pa.

TOOLS—GARDEN

- Allen & Co., Inc., S. L.
Philadelphia, Pa.
Alexander Mfg. Co.
Ames, Iowa
Alliance Mfg. Co., The
Alliance, Ohio
American Fork & Hoe Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Avery & Sons, B. F.
Louisville, Ky.
Bateman Co., Fred H.
Philadelphia, Pa.
Baystate Mfg. Co.
Worcester, Mass.
Dee & Ess Co.
Cassadaga, N. Y.
(See Adv. Index Page 178)
Dobbins Mfg. Co.
North St. Paul, Minn.
(See Adv. Index Page 178)
Empire Plow Co.
Cleveland, Ohio
Eureka Planter Co., Ltd.
Woodstock, Ont., Canada
Frost-Superior Fence Co.
Warren, Ohio
Gilson Co., J. E.
Port Washington, Wis.
Gilson Mfg. Co.
Port Washington, Wis.
Goodell Co.
Antrim, N. H.
Hazlett Mfg. Co.
Kearney, Neb.
Henderson & Co., Peter (Harrows)
New York, N. Y.
(See Adv. Index Page 178)
Hoelt & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Hudson Mfg. Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Imperial Bit & Snap Co.
Racine, Wis.
Iron King Imp. Co.
Madison, Ohio
Johnson, The Firm of William
Newark, N. J.
Kingsbury Mfg. Co. (Trowels)
Keene, N. H.

- Leonard & Son, A. M.**
Piqua, Ohio
(See Adv. Index Page 178)
Metropolitan Material Co.
Brooklyn, N. Y.
Michigan Wire Goods Co.
Niles, Mich.
(See Adv. Index Page 178)
Nash, Inc., Duane H.
Millington, N. J.
Norcross & Sons, C. S.
Bushnell, Ill.
Norris & Bell
Tauranga, New Zealand
Piqua Handle Mfg. Co.
Piqua, Ohio
Reichard Mfg. Co., F. B.
Bangor, Pa.
Schaible Mfg. Co.
Elyria, Ohio
Schling Seedsmen, Inc., Max
New York, N. Y.
Schoener Mfg. Co.
St. Cloud, Minn.
Simmons Hdwe. Co.
St. Louis, Mo.
Swineford Co., G. A.
Canton, Ohio
Wood Shovel & Tool Co.
Piqua, Ohio

TRACTORS

(Also see Garden Tractors, Page 130)

- Advance Rumely Thresher Co., Inc.
La Porte, Ind.
Allis-Chalmers Mfg. Co.
Milwaukee, Wis.
Bates Machine & Tractor Co.
Joliet, Ill.
Bear Tractor, Inc.
New York, N. Y.
C. L. Best Tractor Co.
San Leandro, Calif.
The New Beeman Tractor Co.
Minneapolis, Minn.
Case Threshing Mach. Co., J. I.
Racine, Wis.
Cleveland Tractor Co.
Cleveland, Ohio
Dee & Ess Co.
Cassadaga, N. Y.
(See Adv. Index Page 178)
Deere Tractor Co., John
Waterloo, Iowa
Ford Motor Co.
Detroit, Mich.
Gray Tractor Co., The
Minneapolis, Minn.
Gravelly Motor Plow & Cultivar Co.
Dunbar, W. Va.
Hart-Parr Co.
Charles City, Ia.
Holt Mfg. Co.
Stockton, Calif.
Huber Mfg. Co.
Marion, Ohio
International Harvester Co.
Chicago, Ill.
Indiana Silo Co.
Anderson, Ind.
Kinnard & Sons Mfg. Co.
Minneapolis, Minn.
LeRoy Plow Co.
LeRoy, N. Y.
LaCrosse Tractor Co.
LaCrosse, Wis.
Lawson Mfg. Co., John
New Holstein, Wis.
Minneapolis Threshing Mach. Co.
Hopkins, Minn.
Minneapolis Steel & Mach. Co.
Minneapolis, Minn.
Monarch Tractors Corp.
Springfield, Ill.



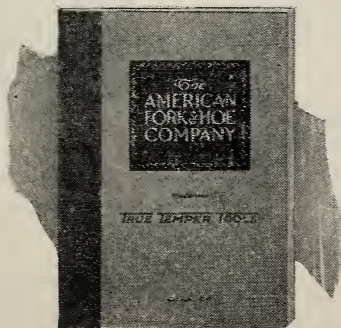
It is the guarantee of the American Fork & Hoe Company (tool manufacturers for over 100 years) that each tool so marked is the best of its kind that can be made.

Our line of wheeled seeders, cultivators and hand tools are of such a quality as to meet the rigid requirements of the seedsmen and nurserymen.

These are described and illustrated in a 143-page Catalog, which we will be pleased to mail on request.

The American Fork & Hoe Company

General Offices: Cleveland, Ohio



FREE
on Request

GARDEN AND FIELD IMPLEMENTS AND SUPPLIES—Continued

Tractors—Continued

Northern Seed & Tractor Co.
Pittsburgh, Pa.
Progressive Machine Co.
Minneapolis, Minn.
Rock Island Plow Co.
Rock Island, Ill.
Rogers Tractor & Trailer Co.
Albion, Pa.
Russell & Co.
Massillon, Ohio
Scott Co., I. W.
Pittsburgh, Pa.
Shaw Tractor Co.
Galesburg, Kans.
The Toro Tractor Co.
Minneapolis, Minn.
Utilitor Co., The
Indianapolis, Ind.
Wetmore, H. A.
Sioux City, Iowa
Wisconsin Farm Tractor Co.
Sauk City, Wis.

TRANSPLANTERS

Kohler Co., F. E.
Canton, Ohio
Letz Mfg. Co.
Crown Point, Ind.
Masters Planter Co.
Chicago, Ill.
Nagley Mfg. Co.
Lyons, N. Y.
New Idea Spreader Co.
Coldwater, Ohio
Wabers Mfg. Co.
Racine, Wis.
Wiard Plow Co.
Batavia, N. Y.

TROWELS

Cronk & Carrier Mfg. Co.
Montour Falls, N. Y.
Hoeft & Co., Inc.
N. Chicago, Ill.
(See Adv. Index Page 178)
Johnson, The Firm of William
Newark, N. J.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)

WEEDERS

Barker Mfg. Co.
David City, Neb.
Bateman Co., Fred H.
Philadelphia, Pa.
Bruner Mfg. Co., R. G.
Ferndale, Mich.
Gilson Co., J. E.
Port Washington, Wis.
Hazeltime, S. I.
Springfield, Mo.
Hoeft & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Hudson Mfg. Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Imperial Bit & Snap Co.
Racine, Wis.
Iron King Imp. Co.
Madison, Ohio
Johnson-Sharp & Co.
Bayfield, Wis.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Michigan Wire Goods Co.
Niles, Mich.
(See Adv. Index Page 178)
Norcross & Sons, C. S.
Bushnell, Ill.
Reichard Mfg. Co., F. B.
Bangor, Pa.
Simplex Company
Seattle, Wash.
Sowrite, Inc.
New York, N. Y.
Ulrich Mfg. Co.
Rock Falls, Ill.
Western Brass Mfg. Works
Chicago, Ill.

WHEELBARROWS

Cleveland Wheelbarrow & Mfg. Co.
Cleveland, Ohio
Defiance Box Co., The
Defiance, Ohio

GREENHOUSE AND FLORAL SUPPLIES**FLORISTS' SUPPLIES**

Barnard Co., W. W.
Chicago, Ill.
(See Adv. Index Page 178)
Bird & Son
East Walpole, Mass.
(See Adv. Index Page 178)
Growell Pot Co., The (Flower Pots)
New York, N. Y.
Lewis, G. B.
Watertown, Wis.
Missouri Pottery & Mfg. Co.
Kansas City, Mo.
Randall Co., A. L.
Chicago, Ill.
Syracuse Pottery, Inc.
Syracuse, N. Y.
Uniform Products Co.
Lancaster, Pa.

FLOWER BOXES

Jacobs & Co., S.
Brooklyn, N. Y.
Neidinger Co., Jos. G.
Philadelphia, Pa.
Raedlein Basket Co.
Chicago, Ill.
Savo Mfg. Co.
Chicago, Ill.
Sprauger & Johnson
Atlantic, Iowa

Success Mfg. Co.
Gloucester, Mass.
Syracuse Pottery, Inc.
Syracuse, N. Y.
Venezia Garden Orn. Co.
(Concrete Boxes)
Chicago, Ill.
Woodcraft Co., The
Dalton, N. Y.
Woodcraft Products Co.
Milford, Ind.
Zane Pottery Co. (Pottery Boxes)
So. Zanesville, Ohio

GLASS

Hews & Co., Inc., A. H.
Syracuse, N. Y.
Hooker Co., H. M.
Chicago, Ill.
Metropolitan Material Co.
Brooklyn, N. Y.

GLASS SUBSTITUTE

Acetol Products Co.
New York, N. Y.

GREENHOUSE MANUFACTURERS

American Greenhouse Mfg. Co.
Chicago, Ill.

ARE YOU SELLING FIELD SEED—

*through the
farmers
elevators?*

They are the logical
retail sales distrib-
utors in practically
every community.

Add to your list of
dealer patrons by
carrying your sell-
ing message in



Eighty-three years
of service to its
field. Write for
advertising rates.

GRAIN WORLD
1018 S. WABASH AVE.
CHICAGO

THE HOME GARDEN SHOVEL OR SPADE-TROWEL



brought a new source of joy
to this woman for her light
tasks among the flowers.

8½x7½ in. blade of best carbon steel,
polished and lacquered, and with popu-
lar rolled-over steps. 33 in. straight
grained handle. Weight, about 2 lbs.
each.

A COMPLETE LINE
of garden tools carried in stock,
including the celebrated Molyb-
denum spades and shovels of
**THE WOOD SHOVEL &
TOOL CO.**

Write for our new 72-page illustrated
catalogue for dealers.

A. M. LEONARD & SON
PIQUA OHIO

GREENHOUSE AND FLORAL SUPPLIES—Continued**Greenhouse Manufacturers—Continued**

Callahan, T. J.
Dayton, Ohio
Dietsch Co., A.
Chicago, Ill.
Foley Greenhouse Mfg. Co.
Forest Park, Ill.
Ickes-Braun Mill Co.
Chicago, Ill.
King Construction Co.
North Tonawanda, N. Y.
Lord & Burnham Co.
Chicago, Ill.
Metropolitan Material Co.
Brooklyn, N. Y.
Moninger & Co., John C.
Chicago, Ill.

GREENHOUSE MATERIAL

American Greenhouse Mfg. Co.
Chicago, Ill.
Callahan Co., T. J.
Dayton, Ohio
Dietsch Co., A.
Chicago, Ill.
Jacobs & Co., S.
Brooklyn, N. Y.
Metropolitan Material Co.
Brooklyn, N. Y.
Moninger & Co., John C.
Chicago, Ill.

HOT BED SASH

Callahan Co., T. J.
Dayton, Ohio
Dietsch Co., A.
Chicago, Ill.
Foley Greenhouse Mfg. Co.
Chicago, Ill.
Gordon-Van Tine Co.
Davenport, Iowa
Jacobs & Co., S.
Brooklyn, N. Y.
Metropolitan Material Co.
Brooklyn, N. Y.
Moninger & Co., John C.
Chicago, Ill.

HOT BED SUPPLIES

Cleveland Buckram & Bag Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Dreer, Henry A.
Philadelphia, Pa.
Levine Bedding Co., David H. (Mats)
New Haven, Conn.
Metropolitan Material Co.
Brooklyn, N. Y.
Palmer Bros.
New London, Conn.
Uniform Products Co.
Lancaster, Pa.

LABELS—PLANT

Ball & Socket Mfg. Co.
West Cheshire, Conn.
Peerless Plant Stake Co., The
Waterloo, Iowa

MOSS, SPHAGNUM

American Bulb Co.
Chicago, Ill.
(See Adv. Index Page 178)
Amundson Co., A. J.
City Point, Wis.
Vaughan's Seed Store
Chicago, Ill.
Williamson, Garfield
New York, N. Y.

MOSS, PEAT

Atkins & Durbrow, Inc.—(Horticultural)
New York, N. Y.

Kier Peat Corp.
Morrison, Ill.
Loewith, Inc., Julius
New York City, N. Y.
(See Adv. Index Page 178)
McHutchison & Co.
New York, N. Y.
(See Adv. Index Page 178)
Pennrich & Co., Inc.
New York, N. Y.
U. S. Trading Co., Importers
Jacksonville, Fla.
Vaughan's Seed Store
Chicago, Ill.

POTS—FLOWER

Bellevue Clay Products Co.
Bellevue, Iowa
Bird & Son
East Walpole, Mass.
(See Adv. Index Page 178)
Central Fibre Co., Inc.
South Gardiner, Maine
Elverson Pottery Co., W. H.
New Brighton, Pa.
Findlay Clay Pot Co.
Findlay, Ohio
Growell Pot Co., Inc.
New York, N. Y.
Harris Mfg. Co., A. W.
Sleepy Eye, Minn.
Hews & Co., A. H.
Cambridge, Mass.
Hilfinger Bros.
Fort Edward, N. Y.
Ionia Pottery Co.
Ionia, Mich.
Kahler Pottery Co.
Louisville, Neb.
Keller Pottery Co., Geo.
Chicago, Ill.
Keller Pottery Co.
Norristown, Pa.
Louisville Pottery Co., Inc.
Louisville, Ky.
Milwaukee Pottery Co.
Milwaukee, Wis.
Mono Service Co.
Newark, N. J.
Neponset Co.
East Walpole, Mass.
Peters & Reed Pottery Co.
Zanesville, Ohio
Pierce, E. Allen
Waltham, Mass.
Pittsburg Pottery Co.
Pittsburg, Kan.
Progressive Clay Co.
Philadelphia, Pa.
Red Wing Union Stoneware Co.
Red Wing, Minn.
Richmond Cedar Works (Cedar Tubs)
Richmond, Va.
Rochelle & Sons, F. W.
Chester, N. Y.
St. Louis Pottery & Mfg. Co.
St. Louis, Mo.
Springfield Clay Mfg. Co.
Springfield, Ohio
Syracuse Pottery Co.
Syracuse, N. Y.
Uhl Pottery Co.
Evansville, Ind.
Washington Brick Co.
Spokane, Wash.
Zane Pottery Co.
So. Zanesville, Ohio

POT SAUCERS—FLOWER

Bird & Son
East Walpole, Mass.
(See Adv. Index Page 178)
Brush Pottery Co.
Zanesville, Ohio
Hilfinger Bros. Pottery
Fort Edward, N. Y.

Jobbers' Discount

on

FULTON'S

Plantabbs

ODORLESS PLANT FOOD TABLETS

25c size.....\$ 3.00 per dozen
50c size..... 6.00 per dozen
\$1.00 size..... 12.00 per dozen
\$3.50 size..... 42.00 per dozen

Less 33 1/3% and 15%

Terms, 2% in 10 days

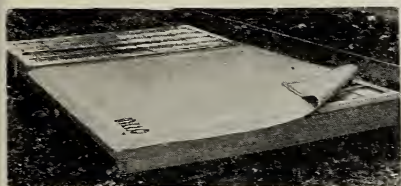
Net 30 days

Delivery charges prepaid

Free advertising matter
supplied

PLANT PRODUCTS COMPANY

117 Fulton Bldg.
BALTIMORE, MD.



The MILO

Waterproof Hotbed Mat

Four years of successive employment has demonstrated the superiority of MILO mats over all others.

From Maine to California—from Texas to Minnesota growers have found MILO mats to be absolutely impervious to rain, sleet and snow—warmer than any other mat—easy to handle.

MILO mats are made in sizes 40x78 in. and 78x80 in. Also in continuous lengths. A mat 78 in. wide by 50 ft. long will cover fifteen 40x76-in. sash, weighs only 90 lbs. and can be taken off or put on by one man in two minutes.

If you want real protection for your hotbeds or cold frame—want to save time and money, write us. Tell us how many mats you require and the lengths of frames and we will quote prices that will interest you.

Manufactured by

The Cleveland Buckram & Bag Co.

1320 Hird Ave. Cleveland, Ohio

A NEW, SAFE SPRAY for Healthier Gardens

FOR FLOWERS, VEGETABLES, VINES, SHRUBS

SHEPS Plant Spray

This NON-POISONOUS, mailable spray controls and kills both sucking and chewing insects, including Aphids, Thrips, Green Flies, Mealy Bugs, Worms, Caterpillars and many others. But while it is sure death to insects, it is absolutely harmless to humans, animals and birds. Neither will it injure the most delicate bloom or plant, but benefits both soil and foliage. Sheps Plant Spray is the easiest to mix. No tedious and time killing soap solutions to prepare. Simply mix with designated amount of water. In twenty seconds you are ready to spray. Endorsed by Florists, Nurserymen, Seedsmen and other users. Fine for the home garden.



Sheps Plant Spray is
NON-POISONOUS and
can be sent through the
U. S. Mail.

Be sure to write
for prices and
dealer's proposition. Nationally
advertised. A
quick and profitable
seller. Free
sample on request.

SHEPARD
Laboratories
Council Bluffs, Ia.

BIRD'S

"Improved"

NEPONSET PAPER FLOWER POT

(Waterproof)



BIRD'S "Improved" Pot recommended for greenhouse use where plants are to stand six to eight weeks.

Ideal for transplanting and
shipping



Write your dealer for samples
and price. Immediate delivery.

BIRD & SON, inc.

East Walpole, Mass.

GREENHOUSE AND FLORAL SUPPLIES—Concluded**Pot Saucers—Flower—Continued**

Mono Service Co.
Newark, N. J.
Northwestern Pottery Co.
Chicago, Ill.
Syracuse Pottery Co., Inc.
Syracuse, N. Y.
Zane Pottery Co.
Zanesville, Ohio

RAFFIA

Kilgore Seed Co.
Plant City, Fla.
Loewith, Inc., Julius
New York City, N. Y.
(See Adv. Index Page 178)
McHutchison & Co.
New York City, N. Y.
(See Adv. Index Page 178)

Meehan Co., Thomas B.
Dresher, Pa.
Schoorl, Adrian J.
San Francisco, Cal.

SEED AND PLANT FORCERS

American Fork & Hoe Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Ball Mfg. Co.
Glenside, Pa.
Brainard's Nurseries & Greenhouses, Inc.
Des Moines, Iowa

TREE AND PLANT TUBS

Richmond Cedar Works
Richmond, Va.

INOCULANTS AND PLANT FOODS**INOCULANTS**

Dickinson Co., The Albert
Chicago, Ill.
Earp Laboratories
Bloomfield, N. J.
Edwards Laboratory, The
Lansing, Mich.
(See Adv. Index Page 178)
Farber Seed Co.
St. Joseph, Mo.
(See Adv. Index Page 178)
Franklin Laboratories, Inc.
Columbus, Ohio
Lockhart Laboratories
Atlanta, Ga.
McQueen Bacteria Co.
Baltic, Ohio
(See Adv. Index Page 178)
Mulford Co., H. K.
Philadelphia, Pa.
(See Adv. Index Page 178)
Nitragin Co., The
Milwaukee, Wis.
(See Adv. Index Page 178)
Standard Inoculation Co.
Troy, Pa.
Standard Inoculation Co.
Glen Ridge, N. J.
Stimulant Laboratories, Inc.
Long Island City, N. Y.
(See Adv. Index Page 178)
Uniform Products Co.
Lancaster, Pa.
Urbana Laboratories
Urbana, Ill.
(See Adv. Index Page 178)
Western Legumo-germ Co.
Topeka, Kan.

PLANT FOODS

Armour Fertilizer Works
Chicago, Ill.

Barrett Co., The
New York City, N. Y.
Bon Arbor Chemical Co.
Paterson, N. J.
Darling & Co.
Chicago, Ill.
Hoover Laboratories, Inc.
Freeport, Ill.
International Agricultural Corp.
New York, N. Y.
Magnesia Products Co.
Milwaukee, Wis.
National Plant Food Co.
Eau Claire, Wis.
Nitragin Co., The
Milwaukee, Wis.
(See Adv. Index Page 178)
Plant Products Co.
Baltimore, Md.
(See Adv. Index Page 178)
Pulverized Manure Co.
Chicago, Ill.
(See Adv. Index Page 178)
Smith Agricultural Chemical Co.
Columbus, Ohio
Stadler Products Co.
Cleveland, Ohio
Stimulant Laboratories, Inc.
Long Island City, N. Y.
(See Adv. Index Page 178)
Swift & Co.
Chicago, Ill.
(See Adv. Index Page 178)
Synthetic Nitrogen Products Corp.
New York, N. Y.
(See Adv. Index Page 178)
Temley Plant Food Co.
Cleveland, Ohio
Virginia Carolina Chem. Co.
Richmond, Va.
(See Adv. Index Page 178)
Williamson, Garfield
New York, N. Y.

LAWN IMPLEMENTS AND SUPPLIES**GARDEN HOSE**

Breeze Metal Hose & Mfg. Co.
Newark, N. J.
Diamond Rubber Co., Inc.
Akron, Ohio
(See Adv. Index Page 178)
Electric Hose & Rubber Co.
Wilmington, Del.
Goodrich Rubber Co.
Akron, Ohio

Goodyear Rubber Co.
Akron, Ohio
Hayes Pump & Planter Co.
Galva, Ill.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Metropolitan Material Co.
Brooklyn, N. Y.
Wilson Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)



Bigger Sales In 1929

DURING the past year, Bloomaid was offered to the public for the first time. Thousands tried it. Results were amazing. Within 30 days plants treated were almost double the size of those which had no Bloomaid. They bloomed 10 days to two weeks earlier. Expert greenhouse men were astonished at its effect on growth and bloom.

You can profit by cataloging and selling it in 1929 because

1st: It is the greatest aid yet produced for growing finer flowers, shrubs and vegetables.

2nd: Every user will get better results from your seed.

3rd: You can concentrate on one line without having to stock many, for Bloomaid comes in tablet, liquid and pulverized form.

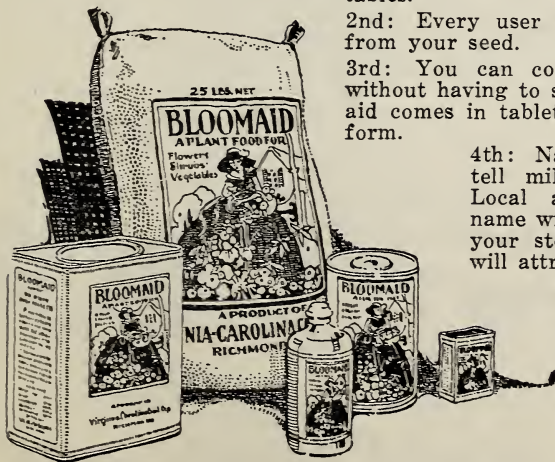
4th: National advertising will tell millions about Bloomaid. Local advertising over your name will focus the demand on your store. Beautiful posters will attract buyers.

Write today for our proposition to seedsmen.

**VIRGINIA-CAROLINA
CHEMICAL CORP.**

Lawn & Garden Dept.
Richmond, Va.

Packed in boxes of 125 tablets, in liquid form, in 1 and 5 lb. cans and 25 and 100 lb. bags.



LAWN IMPLEMENTS AND SUPPLIES—Continued

HEDGE TRIMMERS

Cronk & Carrier Mfg. Co.
Montour Falls, N. Y.
Disston & Sons, Inc., Henry
Philadelphia, Pa.
Jaeger Prod. Co.
Trenton, N. J.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Trenton Patent Mfg. Co.
Trenton, N. J.

HOSE CLAMPS

Allen Mfg. Co., W. D.
Chicago, Ill.

HOSE MENDERS

Allen Mfg. Co., W. D.
Chicago, Ill.

HOSE NOZZLES

Allen Mfg. Co., W. D.
Chicago, Ill.

LAWN EDGE TRIMMERS

Allen & Co., Inc., S. L.
Philadelphia, Pa.
Ideal Mfg. Co.
Davenport, Iowa
Imperial Bit & Snap Co.
Racine, Wis.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Miller & Sons Co.
Waterloo, Iowa

LAWN FURNITURE AND DECORATIONS

American Thermo-Ware Co., Inc.
(Gazing Globes)
New York, N. Y.
(See Adv. Index Page 178)
Express Body Corp.
Crystal Lake, Ill.
Hartman-Sanders
Chicago, Ill.
Homecraft Spec. Co.
Mattoon, Ill.
Logan Co.
Louisville, Ky.
Northwest Fence & Wire Works
Portland, Ore.
Randall Co., A. L.
Chicago, Ill.
Smith Iron & Wire Wks., F. P.
Chicago, Ill.
Syracuse Pottery, Inc.
Syracuse, N. Y.
Woodcraft Co., The
Dalton, N. Y.
Woodcraft Products Co.
Milford, Ind.

LAWN GRASS SEED

(See Page 105)

LAWN MOWER SHARPENERS

Berghman Co.
Chicago, Ill.

LAWN MOWERS

American Lawn Mower Co.
Muncie, Ind.
Clarinda Mfg. Co.
Clarinda, Iowa.
Clipper Lawn Mower Co.
Dixon, Ill.

Coldwell Lawn Mower Co.
Newburgh, N. Y.
Cushman Motor Works
Lincoln, Nebr.
Eclipse Lawn Mower Co.
Prophetstown, Ill.
Elwood Lawn Mower Mfg. Co.
Elwood, Ind.
Gilson Mfg. Co.
Port Washington, Wis.
Henley Lawn Mower Co.
Richmond, Ind.
Ideal Power Lawn Mower Co.
Lansing, Mich.
Jacobsen Mfg. Co.
Racine, Wis.
Milbradt Mfg. Co.
St. Louis, Mo.
Modern Machine Works (Power Mowers)
Milwaukee, Wis.
Moto-Mower Co.
Detroit, Mich.
Philadelphia Lawn Mower Co.
Philadelphia, Pa.
Red-E. Mfg. Co.
Milwaukee, Wis.
Rich Steel Prod. Co.
Battle Creek, Mich.
Roseman Tractor Mower Co.
Evanston, Ill.
Stearns & Co., E. C.
Syracuse, N. Y.
Townsend & Co., S. P.
Orange, N. J.
Worthington Mower Co.
Stroudsburg, Pa.

LAWN ROLLERS

Graham & Co., John H.
New York City, N. Y.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
Wilder-Strong Implement Co.
Monroe, Mich.

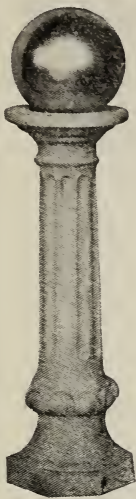
LAWN SPRINKLERS

Allen Mfg. Co., W. D.
Chicago, Ill.
Armstrong Mfg. Co.
Huntington, W. Va.
Dayton Irrigation Co.
Dayton, Ohio
Double Rotary Sprinkler Co.
Kansas City, Mo.
General Basic Products Co.
Seattle, Wash.
Hardware Supply Co.
Grand Rapids, Mich.
Imperial Bit & Snap Co.
Racine, Wis.
Leonard & Son, A. M.
Piqua, Ohio
(See Adv. Index Page 178)
March Automatic Irrigation Co.
Muskegon, Mich.
Peck Bros. & Co.
New Haven, Conn.
Rainbow Sprinkler Co.
Jacksonville, Fla.
Scollay, John A.
Brooklyn, N. Y.
Skinner Irrigation Co.
Troy, Ohio
Wilgus Mfg. Co.
Los Angeles, Calif.
X. L. Mfg. Co.
Chicago, Ill.

LIME

International Agricultural Corp.
New York, N. Y.
Lavino & Co., E. J.
Philadelphia, Pa.
Marble Cliff Quarries Co.
Columbus, Ohio

GAZING GLOBES



Gazing Globes displayed on pedestals of your own manufacture bring a lot of new business.

A T C O Gazing Globes are made of white, heavy glass, and the silvering is put on so that it will last without blemish.

We have been importers of Gazing Globes for 18 years and carry stock of 8", 10", 12", 14", 16" and 18" sizes.

Write for Prices

American Thermo-Ware Co., Inc.
16 Warren St., New York, N. Y.

Do You Agree With This Dealer?



"Reef Brand is easy to handle. No waste. No broken bag. The elimination of dust makes Reef Brand 100% value both to the dealer and his trade."

Win friends for your store with Reef Brand. Increase your business and your profit. Everywhere poultrymen are demanding Reef Brand for their flock. Stock up with Reef Brand and answer every demand with a sale.

Reef Brand

REGISTERED IN U.S. PATENT OFFICE

**Pure Crushed Oyster Shell
for Poultry**

GULF CRUSHING COMPANY
New Orleans

"GROZ-IT" For Lawns and Gardens

Pulverized Sheep Manure

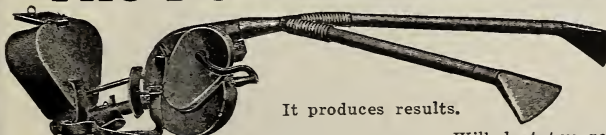
Many times as efficient as ordinary manure. Odorless, does not draw flies, easy to handle, **guaranteed free from weed seeds and foreign matter**—packed in 100-pound bags. For your lawns, gardens, window boxes, potted plants, golf greens, orchards, vineyards. It is good for anything that grows.

PACIFIC MANURE & FERTILIZER CO.
MANUFACTURERS AND DISTRIBUTORS

429 Davis Street

San Francisco, Cal.

The Peerless Hand Dust Gun



It produces results.

**will make friends.
Supply your
trade with a
real hand duster.**

It is perfectly balanced—load divided front and rear.

The amount of discharge can be regulated. Fan is ball bearing and hub is packed in grease.

Will dust two rows.

Will dust underneath the leaves.

Will dust anything from strawberries to apples.

Write for prices and mention this paper.

**5100 St. Claire Ave.
Cleveland, Ohio**

Peerless Dust Gun Company

LAWN IMPLEMENTS AND SUPPLIES—Concluded

Lime—Continued

Wilson, Inc., Andrew
Springfield, N. J.

(See Adv. Index Page 178)

MOLE AND ANIMAL TRAPS

Abington Trap Co.
Abington, Ill.

Michigan Wire Goods Co.

Niles, Mich.

(See Adv. Index Page 178)

Roper Co., J. R.
San Leandro, Calif.

RAKES—BAMBOO

American Import Co.
San Francisco, Calif.

PETS AND PET SUPPLIES

BIRDS

Bishop, Henry, The Bird Man
Baltimore, Md.

Des Moines Bird Co., Inc.
Des Moines, Iowa

Hedwig's Pet Shop
Scranton, Pa.

Mussog's Bird Store
Philadelphia, Pa.

National Pet Shops
St. Louis, Mo.

Robison, Ansel W.
San Francisco, Calif.

Schlagheck, Jos.
Toledo, Ohio

Schmeiser's Canary & Pet Plant
Buffalo, N. Y.

"Steins" Canary Plant
Philadelphia, Pa.

Vahle, E. C.
Chicago, Ill.

BIRD CAGES

Hendryx Co., Andrew B.
New Haven, Conn.

Lindemann & Co., O.
New York, N. Y.

National Pet Shops
St. Louis, Mo.

Raedlein Basket Co.
Chicago, Ill.

Schlagheck, Jos.
Toledo, Ohio

Schoemann & Mayer
New York City, N. Y.

"Steins" Canary Plant
Philadelphia, Pa.

BIRD CAGE STANDS—METAL

Lindemann & Co., O.
New York, N. Y.

Hendryx Co., Andrew B.
New Haven, Conn.

Woodcraft Products Co.
Milford, Ind.

BIRD HOUSES

Burt Co., William D.
Dalton, N. Y.

Crescent Co.

Toms River, P. O. N. J.

(See Adv. Index Page 178)

Dodson, Jos. H.
Kankakee, Ill.

Express Body Corp.
Crystal Lake, Ill.

Rieber Bird Homes
West Webster, N. Y.

Schaad & Son, E. J.
Merrill, Wis.

Schling Seedsmen, Inc., Max
New York, N. Y.

Woodcraft Co., The
Dalton, N. Y.

BIRD SEED AND SUPPLIES

American Seed & Food Products
Chicago, Ill.

Bartels, Henry
New York, N. Y.

Burnet Co., Inc.
Newark, N. J.

Burt Co., W. D.
Dalton, N. Y.

Curtin Company, George L.
New York, N. Y.

Evans Bros.

Evanston, Ill.

Hinton & Co., Inc.
New York, N. Y.

Horton Co., Inc., F. T.
Hoboken, N. J.

Imperial Pet Shop
New York, N. Y.

Johnson, Inc., J. Oliver
Chicago, Ill.

Justrite Co., The
Milwaukee, Wis.

Magnesia Products Co.
Milwaukee, Wis.

Miracrus Bird Food Co.
Clifton Hill, Mo.

National Pet Shops
St. Louis, Mo.

Nature Friend, The
New York, N. Y.

Philadelphia Seed Co.
Philadelphia, Pa.

(See Adv. Index Page 178)

Radwaner Seed Co., I. L.—(Bird Seed)
New York City, N. Y.

(See Adv. Index Page 178)

Rohleder, J. O.

Leipsig Entrits. sch., Germany

Scarlett & Co., Wm. G.—Bird Food
Baltimore, Md.

Schlagheck, Jos.
Toledo, Ohio

"Steins" Canary Plant
Philadelphia, Pa.

Von Damm, F. H.—Bird Food
Brooklyn, N. Y.

DOG FOODS AND SUPPLIES

Bartels, Henry
New York, N. Y.

Battle Creek Dog Food Co.
Battle Creek, Mich.

(See Adv. Index Page 178)

Bennett Biscuit Co., F. H.
New York City, N. Y.

Champion Animal Food Co.
Minneapolis, Minn.

Chappell Bros., Inc.
Rockford, Ill.

Glover Co., Inc., H. Clay
New York, N. Y.

Good, Inc., James
Philadelphia, Pa.

Justrite Co., The
Milwaukee, Wis.

Imperial Biscuit Co.
Sackett's Harbor, N. Y.

Olding Food Corp., Dr.
New York, N. Y.

Peerless Dog Food Co.
Battle Creek, Mich.

Perfection Food Co.
Battle Creek, Mich.

Potter-Wrightington, Inc.
Boston, Mass.

Russell-Heckle Seed Co.
Memphis, Tenn.

Scott Co., I. W.
Pittsburgh, Pa.

Spratt's Patents, Ltd.
Newark, N. J.



BUILD UP YOUR DOG FOOD SALES

WITH

MILLER'S A 1 PRODUCTS

"Battle Creek Health Food for Dogs"

Seed Dealers everywhere are building a tremendous business on dog food foods.

Carry the line your customers are asking for, over 3,000,000 pounds of Miller's Dog Foods sold last year.

Our National and direct mail advertising campaign will help you build a fast growing year round business.

FREE—

A merchandising plan for Seed Dealers will be sent free. This explains how you can clinch the dog food business in your city. Write for samples and particulars.



Battle Creek Dog Food Co.

Battle Creek, Michigan



MOLE TRAPS WIRE POTATO SCOOPS

in

Popular Demand

Mr. Seed Store Owner—

Here are two splendid items for retail seed store distribution; they are specialties that fit in and find a ready sale with seed store patronage.

Mr. Catalog Seedsman—

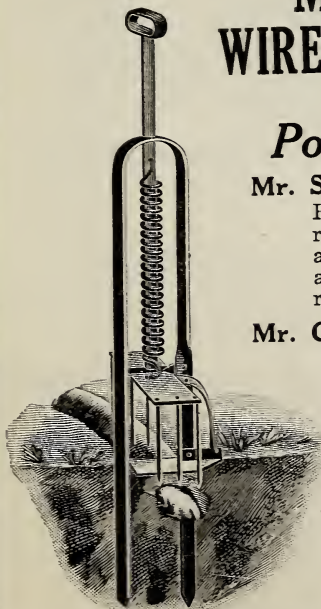
You will be surprised by the large per cent of your orders that include these two standard items.

We furnish electros for listing.

WRITE TODAY FOR DEALERS'
PRICES

**MICHIGAN
WIRE GOODS CO.**

Second St., Niles, Mich.



PETS AND PET SUPPLIES—Continued**Dog Foods and Supplies—Continued**

Wapler Co., Nicholas
New York, N. Y.
Wilson & Co., Inc.
Chicago, Ill.

GOLD FISH AND SUPPLIES

American Seed & Food Products Co.
Chicago, Ill.
Ashbourne Goldfish & Supply Co.
Burlington, Iowa
Auburndale Goldfish Co.
Chicago, Ill.
Bishop, Henry—The Bird Man
Baltimore, Md.
Bruce Fisheries
Thornburg, Iowa
Hanz, H. W.
New Braunfels, Texas
Heck, C. C. (Gold Fish Farm)
Greeley, Colo.
Justrite Co., The
Milwaukee, Wis.

Lakeview Ponds, The
Mt. Airy, Cincinnati, Ohio
Loveland Goldfish Farms
Loveland, Ohio
Mussog's Bird Store
Philadelphia, Pa.
Putnam's Fisheries
Buffalo, N. Y.
Schlagheck, Joseph
Toledo, Ohio
Spring Lake Fishery
Waldron, Ind.
Tamms Silica Co. (Pebbles)
Chicago, Ill.
Vahle, E. C.
Chicago, Ill.
Wapler Co., Nicholas
New York, N. Y.

RABBITS

Summit Rabbitry
Bernharts, Pa.

POULTRY SUPPLIES**BABY CHICKS**

Acme Baby Chick Hatchery
Peoria, Ill.
Atz Hatchery Co.
Milltown, Ind.
Barr & Son, P.
Zeeland, Mich.
Berry's Poultry Farm
Clarinda, Iowa
Burt Co., W. D.
Dalton, N. Y.
Chick Hatchery, O. K.
Frenchtown, N. J.
Gilt Edge Poultry Ranch
Zeeland, Mich.
Hoosier Chick Hatchery
Indianapolis, Ind.
Illinois Hatchery
Metropolis, Ill.
Johnson Hatchery, Alf.
Leonardville, Kans.
Lakeview Poultry Farm
Holland, Mich.
Mary Maude Farms
Portland, Ind.
Meadow View Hatchery
St. Peter, Minn.
Miller Hatcheries
Lancaster, Mo.
Missouri Hatchery
Bowling Green, Mo.
Nabob Hatcheries
Gambier, Ohio
Sunshine Hatchery
Corydon, Ind.
Van Wert Hatchery
Van Wert, Ohio

BABY CHICK BOXES

Anderson Box Co.
Indianapolis, Ind.
Hinde & Dauch Paper Co.
Sandusky, Ohio
Keipper Cooping Co.
Milwaukee, Wis.
Sefton Mfg. Co.
Chicago, Ill.

BROODERS

American Brooder Corp.
Alhambra, Calif.
(See Adv. Index Page 178)
Buckeye Incubator Co.
Springfield, Ohio
Buffalo Incubator Co.
Buffalo, N. Y.

Hoeft & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Liberty Marvel Co.
Philadelphia, Pa.
Miller Co., J. W.
Rockford, Ill.
Oakes Mfg. Co.
Tipton, Ind.
Ohio Rake Co.
Dayton, Ohio
Phelan Brooder Co.
Oklahoma City, Okla.
Queen Incubator Co.
Lincoln, Neb.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Reliable Incubator & Brooder Co.
Quincy, Ill.
Sheer, H. M.
Quincy, Ill.
Simplex Brooder Stove Co.
Grand Rapids, Mich.
(See Adv. Index Page 178)
Thermo-Electric Co., Inc.
New Orleans, La.

BROODERS—STORAGE

Buckeye Incubator Co.
Springfield, Ohio
Miller-Ross Company
Lancaster, Pa.

CARBOLINEUM

C-A Wood Preserver Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Carbolineum Wood Preserving Co.
Milwaukee, Wis.

CHARCOAL-GROUND HARDWOOD

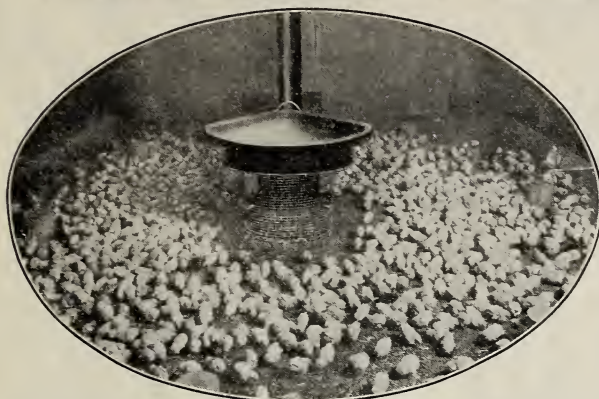
Gulf City Mfg. Co.
Mobile, Ala.
Tennessee Eastman Corp.
Kingsport, Tenn.

DISINFECTANTS

Allen Mfg. Co., D. E.
Carthage, N. Y.
Bourbon Remedy Co.
Lexington, Ky.
C-A Wood Preserver Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Carbolineum Wood Preserving Co.
Milwaukee, Wis.

SIMPLEX BROODER STOVE

GREATEST MOTHER OF THEM ALL



For 16 years the Simplex Brooder Stove has brooded chicks successfully for thousands of poultry men. The oil burning stove with a smoke pipe that acts as a vent pipe — powerful direct oil burner — automatic heat regulator — Simplex Stoves save time, labor and bother — makes more profits for the user. Every

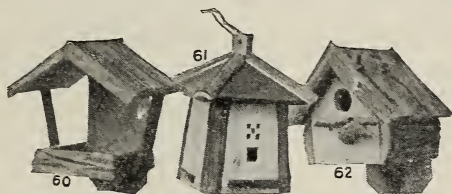
stove sold on a 30-day guarantee. Write today for catalog and dealer's price list.

SIMPLEX BROODER STOVE CO.

5800 Ellsworth Ave. S. W.

Grand Rapids, Mich.

Sweet
Smelling
Rustic
Cedar
Bird
Houses



18 designs
priced at
"3—for
\$5.00"

SEND \$3.00 FOR SAMPLES AND SPECIAL TERMS TO SEED STORES. Many Stores have found this a splendid side line. The Decoration Value in your Store can not be overlooked.

Crescent Co.

Toms River P. O., N. J.

CARBOLINEUM

Applied by Spray or Brush

RECOMMENDED IN U. S. FARM BULLETINS
801 and 1070 to Kill Mites, Ticks and Blue Bugs

We have sold it for 40 years. Packed in cans and drums.

Write for prices.

C-A-WOOD PRESERVER CO.

6627 Delmar Blvd.

St. Louis, Mo.



POULTRY SUPPLIES—Continued

Disinfectants—Continued

- Carbola Chemical Co.,
Long Island City, N. Y.
- Chipman Chem. Engineering Co., Inc.
Bound Brook, N. J.
- Conkey Co., G. E.
Cleveland, Ohio
- Friedman Tobacco Products Corp
York, Pa.
- Frost Insecticides
Arlington, Mass.
- Gateway Chemical Co.
Kansas City, Mo.
- General Basic Products Co.
Seattle, Wash.
- General Laboratories
Madison, Wis.
- Germo Mfg. Co.
St. Louis, Mo.
- Good, Inc., James
Philadelphia, Pa.
- LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
- Modern Products Corp.
Chicago, Ill.
- Pratt Food Co.
Philadelphia, Pa.
- Quisenberry-Hobbs Co.**
Kansas City, Mo.
(See Adv. Index Page 178)
- Sherwin-Williams
Cleveland, Ohio
- Tobacco By-Products and Chemical Corp.**
Louisville, Ky.
(See Adv. Index Page 178)
- Sterelac Co., The
North Chicago, Ill.
- Wilson, Inc., Andrew**
Springfield, N. J.
(See Adv. Index Page 178)

DRINKING FOUNTAINS

- American Brooder Corp.**
Alhambra, Calif.
(See Adv. Index Page 178)
- Baier Bros. Mfg. Co.
Cissna Park, Ill.
- Clarke Tank Co., J. Q.
Crawfordsville, Ind.
- Hoelt & Co., Inc.**
North Chicago, Ill.
(See Adv. Index Page 178)
- Miller Co., J. W.
Rockford, Ill.
- National Poultry Band Co.
Newport, Ky.
- Oakes Mfg. Co.
Tipton, Ind.
- Perfection Mfg. Co.
Monmouth, Ill.
- Quisenberry-Hobbs Co.**
Kansas City, Mo.
(See Adv. Index Page 178)
- Reliable Inc. & Brooder Co.
Quincy, Ill.
- Simplex Brooder Stove Co.**
Grand Rapids, Mich.
(See Adv. Index Page 178)
- Thompson & Sons, O. E.
Ypsilanti, Mich.

EGG CARTONS

- Gaylord, Inc., Robert
St. Louis, Mo.
- Hinde & Dauch Paper Co.
Sandusky, Ohio
- Hoelt & Co., Inc.**
North Chicago, Ill.
(See Adv. Index Page 178)
- Metal Egg Crate Co.
Fredericksburg, Va.
- Safe-Service Egg Case Co.
Three Rivers, Mich.
- Surety Egg Box Co.
Hohokus, N. J.

FEED—POULTRY

- Ackerman Co., The**
Lima, Ohio
(See Adv. Index Page 178)
- Albert Angell Jr. Co.
Chicago, Ill.
- American Dry Milk Institute
Chicago, Ill.
- American Milling Co.
Peoria, Ill.
- Arcady Farms Milling Co.
Chicago, Ill.
- Badenoch Co., J. J.
Chicago, Ill.
- Bell's, Ltd.
Prince Albert, Saskatchewan
- Blamberg Bros., Inc.**
Baltimore, Md.
(See Adv. Index Page 178)
- Burrell-Dugger Co.
Indianapolis, Ind.
- Chapin & Co.
Chicago, Ill.
- Collis Products Co. (Dried Buttermilk)
Clinton, Iowa
- Conkey Co., G. E.
Cleveland, Ohio
- Consolidated Products Co.
(Semi-Solid Buttermilk)
Chicago, Ill.
- Dacotah Seed Co.**
Bismarck, N. D.
(See Adv. Index Page 178)
- Darling & Co.
Chicago, Ill.
- Dickinson Co., The Albert
Chicago, Ill.
- Douglas Co.
Cedar Rapids, Iowa
- Edgar-Morgan Co.
Memphis, Tenn.
- Edwards & Co., Inc., S. T.
(Dried Buttermilk and Dry Skim Milk)
Chicago, Ill.
- Harvey Seed Co.**
Buffalo, N. Y.
(See Adv. Index Page 178)
- Hardeman-King Co.
Amarillo, Texas
- Hales & Hunter Co.
Chicago, Ill.
- Hecker, H-O Co., Inc.
Buffalo, N. Y.
- Jameson-Hevener Co.
St. Paul, Minn.
- Ko-Vita Co. (Cod Liver Oil)
Bloomfield, N. J.
- Krause Milling Co.
Milwaukee, Wis.
- Magill & Co.**
(Operating Fargo Seed House)
Fargo, N. D.
(See Adv. Index Page 178)
- Marden Wild Corp. (Cod Liver Oil)
Somerville, Mass.
- National Oil Products Co. (Cod Liver Oil)
Harrison, N. J.
- Northrup, King & Co.**
Minneapolis, Minn.
(See Adv. Index Page 178)
- Northwestern Yeast Co.
Chicago, Ill.
- Ouren Seed Co.**
Council Bluffs, Iowa
(See Adv. Index Page 178)
- Philadelphia Seed Co.**
Philadelphia, Pa.
(See Adv. Index Page 178)
- Pratt Food Co.
Philadelphia, Pa.
- Quaker Oats Co.
Chicago, Ill.
- Quisenberry-Hobbs Co. (Mineral)**
Kansas City, Mo.
(See Adv. Index Page 178)

Kill **Bugs**
the
Moth, Weevil
and Worms

With

DOUGLAS
ANNIA GERM

NEW LOW PRICES

100% *Active Ingredients*

JEROME B. RICE SEED CO.

Detroit, Mich.

HENRY A. DREER

Philadelphia, Pa.

HENRY F. MITCHELL SEED CO.

Philadelphia, Pa.

D. LANDRETH SEED CO.

Bristol, Pa.

J. D. LONG SEED CO.

Boulder, Colo.

BOWMAN BROS. SEED CO.

Concordia, Kan.

J. C. LEONARD SEED CO.

Chicago, Ill.

The above representative Seed Firms
 and hundreds of others have used Annia
 Germ for years

INCORPORATED 1916

Douglas Chemical & Supply Company

825-827 South West Boulevard

Kansas City, Mo.

Sole Manufacturers and Distributors

POULTRY SUPPLIES—Continued

Feed—Poultry—Continued

Radwaner Seed Co., I. L.
 New York City, N. Y.
 (See Adv. Index Page 178)

Ralston Purina Co.
 St. Louis, Mo.

Sanders Mfg. Co., J. M.
 Atlanta, Ga.

Scarlett & Co., Wm. G.
 Baltimore, Md.

Tioga Mill & Elevator Co.
 Waverly, N. Y.

Ubiko Milling Co.
 Cincinnati, Ohio

Universal Mills
 Ft. Worth, Texas

Universal Products Sales Co., Inc.
 New York, N. Y.

Vitality Mills
 Chicago, Ill.

Washburn-Crosby Co.
 Minneapolis, Minn.

Wells-Osen Milling Co.
 Depere, Wis.

Wilson & Co., Inc.
 Chicago, Ill.

Wood & Son, T. W.
 Richmond, Va.

FEED HOPPERS

American Brooder Corp.
 Alhambra, Calif.
 (See Adv. Index Page 178)

Baier Bros. Mfg. Co.
 Cissna Park, Ill.

Hicks, H. W.
 Huntington, Ind.

Hoelt & Co.
 North Chicago, Ill.
 (See Adv. Index Page 178)

Hornbeck, W. M.
 Peoria, Ill.

Jacobus, M. R.
 New York City, N. Y.

National Poultry Band Co.
 Newport, Ky.

Oakes Mfg. Co.
 Tipton, Ind.

Quisenberry-Hobbs Co.
 Kansas City, Mo.
 (See Adv. Index Page 178)

Thompson & Sons, O. E.
 Ypsilanti, Mich.

Wasteless Feeder Co.
 Sauk City, Wis.

GRIT

Georgia Mineral Products Co.
 Tate, Ga.

Limestone Products Corp. of America
 Newton, N. J.

Louisiana Crushing Co.
 Houma, La.

Ohio Marble Co.
 Piqua, Ohio

Rockfield Products Co.
 Milwaukee, Wis.

INCUBATORS

American Brooder Corp.
 Alhambra, Calif.
 (See Adv. Index Page 178)

Automatic Incubator Co.
 Delaware, Ohio

Buckeye Incubator Co.
 Springfield, Ohio

Buffalo Incubator Co.
 Buffalo, N. Y.

Des Moines Incubator Co.
 Des Moines, Iowa

Hoelt & Company, Inc.
 North Chicago, Ill.
 (See Adv. Index Page 178)

Miller Co., J. W.
 Rockford, Ill.

Oakes Mfg. Co.
 Tipton, Ind.

Prairie State Incubator Co.
 Homer City, Pa.

Queen Incubator Co.
 Lincoln, Neb.

Quisenberry-Hobbs Co.
 Kansas City, Mo.
 (See Adv. Index Page 178)

Reliable Incubator & Brooder Co.
 Quincy, Ill.

Smith Incubator Co.
 Cleveland, Ohio

Sure Hatch Incubator Co.
 Fremont, Neb.

Thermo-Electric Co., Inc.
 New Orleans, La.

LEG BANDS

Bayerdorfer, M.
 Huguenot Park, N. Y.

Cadwallader Mfg. Co.
 Salem, Ohio.

Cyclone Mfg. Co.
 Urbana, Ind.

Hoelt & Co.
 North Chicago, Ill.
 (See Adv. Index Page 178)

Illinois Supply Co.
 Aurora, Ill.

Miller Co., J. W.
 Rockford, Ill.

National Poultry Band Co.
 Newport, Ky.

Oakes Mfg. Co.
 Tipton, Ind.

Stiles, Charles L.
 Columbus, Ohio

LICE KILLERS

Allaire, Woodward & Co.
 Peoria, Ill.

Bourbon Remedy Co.
 Lexington, Ky.

Burrell-Dugger Co.
 Indianapolis, Ind.

C-A Wood Preserver Co.
 St. Louis, Mo.
 (See Adv. Index Page 178)

Carbolineum Wood Preserving Co.
 Milwaukee, Wis.

Carbola Chemical Co.
 Long Island City, N. Y.

Conkey Co., G. E.
 Cleveland, Ohio

Germo Mfg. Co.
 St. Louis, Mo.

Good, Inc., James
 Philadelphia, Pa.

Klein-Lambert Co., The
 Blue Island, Ill.

Lee Co., Geo. H.
 Omaha, Neb.

LeGear Medicine Co., Dr. L. D.
 St. Louis, Mo.

Modern Products Corp.
 Chicago, Ill.

National Poultry Band Co.
 Newport, Ky.

Pratt Food Co.
 Philadelphia, Pa.

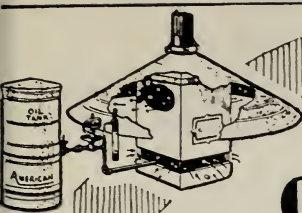
Quisenberry-Hobbs Co.
 Kansas City, Mo.
 (See Adv. Index Page 178)

Reynolds Mfg. Co.
 Fredericktown, Ohio

Sherwin-Williams Co.
 Cleveland, Ohio

Uniform Products Co.
 Lancaster, Pa.

Wilson, Inc., Andrew
 Springfield, N. J.
 (See Adv. Index Page 178)



from the
Atlantic TO THE **Pacific**
from
Canada TO THE **Gulf of Mexico**

FOR TWENTY YEARS

American Brooders have rendered honest and efficient service to thousands of satisfied users—

THERE'S A REASON—

ASK THE MAN WHO OWNS ONE

Made in a wide range of designs and sizes to meet every requirement.

Sold on a money-back guarantee. Prompt delivery to all points in United States and Canada guaranteed.

Write for Catalog

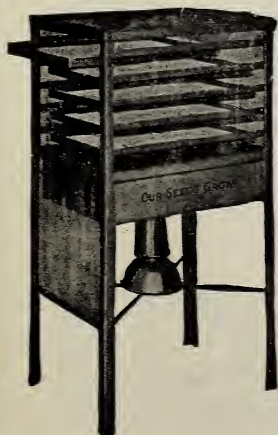
Inquiries from Jobbers and Dealers invited

AMERICAN BROODER CORPORATION

Manufacturers of Oil, Gas, Coal and Electric Brooders
 Incubators and Poultry Supplies

Alhambra, California

DAYLIGHT GERMINATOR
*The Sho-Gro Shows
 the Growth*



**Rapid — Accurate —
 Inexpensive**

ELECTRIC OR OIL HEAT

Write for Full Particulars Today

Seed Trade Reporting Bureau
 1018 South Wabash Ave., CHICAGO, ILL.

European Representatives

Kelway & Son, Langport, Somerset, England

POULTRY SUPPLIES—Continued

MARKING PUNCHES

Bayerdorfer, M.
Huguenot Park, N. Y.
Cyclone Mfg. Co.
Urbana, Ind.
Hoeft & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Illinois Supply Co.
Aurora, Ill.
Miller Co., J. W.
Rockford, Ill.
National Poultry Band Co.
Newport, Ky.
Reliable Incubator & Brooder Co.
Quincy, Ill.

MEAT SCRAPS

Darling & Co.
Chicago, Ill.
Parmenter & Polsey Fertilizer Co.
Boston, Mass.
Stadler Products Co.
Cleveland, Ohio
Wilson & Co., Inc.
Chicago, Ill.
Swift & Co.
Chicago, Ill.

NEST EGGS

Hoeft & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Illinois Supply Co.
Aurora, Ill.
Opal Glass Co.
Fairmont, W. Va.
Reliable Incubator & Brooder Co.
Quincy, Ill.
Reynolds Mfg. Co.
Fredericktown, Ohio
Wood & Son, T. W.
Richmond, Va.

OYSTER SHELLS

Gulf City Mfg. Co.
Mobile, Ala.
Gulf Crushing Co., Inc.
New Orleans, La.
(See Adv. Index Page 178)
Louisiana Crushing Co.
Houma, La.
Mull Co., Leo B.
Cedar Rapids, Iowa
Peerless Oyster Co.
Baltimore, Md.

PIGEON SUPPLIES

Bayerdorfer, M.
Huguenot Park, N. Y.
Illinois Supply Co.
Aurora, Ill.
Scarlett & Co., Wm. G.
Baltimore, Md.

POULTRY REMEDIES

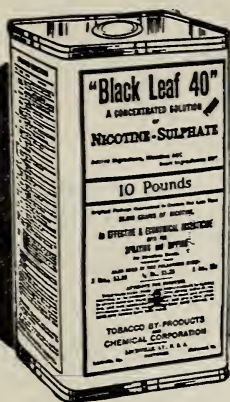
Barnes Emulsion Co.
St. Louis, Mo.
Bee Dee Stock Medicine Co.
Chattanooga, Tenn.
Bourbon Remedy Co.
Lexington, Ky.
Burrell-Dugger Co.
Indianapolis, Ind.
Carbola Chemical Co.
Long Island City, N. Y.
Conkey Co., G. E.
Cleveland, Ohio
French Co., R. T.
Rochester, N. Y.
Germe Mfg. Co.
St. Louis, Mo.

Glover Co., Inc., H. Clay
New York City, N. Y.
Good, Inc., James
Philadelphia, Pa.
Illinois Supply Co.
Aurora, Ill.
Klein-Lambert Co.
Blue Island, Ill.
Lee Co., Geo. H.
Omaha, Neb.
LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
Long Emulsion Co.
Terre Haute, Ind.
(See Adv. Index Page 178)
Modern Products Corp.
Chicago, Ill.
Old Kentucky Mfg. Co.
Paducah, Ky.
Pearson-Ferguson Co.
Kansas City, Mo.
Portland Seed Co.
Portland, Ore.
Pratt Food Co.
Philadelphia, Pa.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Salsbury, Dr. J. E.
Charles City, Iowa
Supto Products Co.
Kansas City, Mo.
Tobacco By-Products and Chemical Corp.
Louisville, Ky.
(See Adv. Index Page 178)
Uniform Products Co.
Lancaster, Pa.
Vitone Mineral Co.
Lancaster, Ohio
Wight Company
Lamoni, Ia.
Williamson, Garfield
New York, N. Y.
Wood & Sons, T. W.
Richmond, Va.

POULTRY SUPPLIES

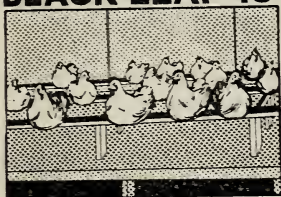
American Brooder Corp.
Alhambra, Calif.
(See Adv. Index Page 178)
Bernard Co., Phillip
Sioux City, Iowa
Better Products Co.
Burlington, Wis.
Bowine Mfg. Co.
Melrose, Mass.
Brower Mfg. Co.
Quincy, Ill.
Burnet Co., Inc.
Newark, N. J.
Burrell-Dugger Co.
Indianapolis, Ind.
Cadwallader Mfg. Co.
Salem, Ohio
Clarke Tank Co., J. Q.
Crawfordsville, Ind.
Conkey Co., G. E.
Cleveland, Ohio
Crowley Co., Inc., Geo. H.
San Francisco, Calif.
Cyclone Mfg. Co.
Urbana, Ind.
Evapometer Company
Fargo, N. D.
Felker, C. H.
Boston, Mass.
Gaylord, Inc., Robert
St. Louis, Mo.
Harvey Seed Co.
Buffalo, N. Y.
(See Adv. Index Page 178)
Hoeft & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Holser & Co., B. I.
Walkerton, Ind.

Your Customers Know "Black Leaf 40"



"Black Leaf 40" is packed in 10 lb. tins, 2 lb. tins and in $\frac{1}{2}$ lb. bottles for commercial use and in oz. bottles for smaller flower and vegetable growers. Price list and information sent on request. Also electrotypes and advertising material for your use.

'BLACK LEAF 40'



WORKS WHILE THEY ROOST

Growers and orchardists have known and used "Black Leaf 40" for protecting their crops against destructive insects for nearly a quarter of a century; consequently the mere announcement that "Black Leaf 40" will control poultry lice is bound to make sales greatly increase. It will pay you to list "Black Leaf 40" in your seed catalogs and bulletins so that your customers are sure to know you handle it. We are advertising the various uses for "Black Leaf 40" to your customers, cash in on this substantial business that is waiting for you.

Tobacco By-Products & Chemical Corporation
Incorporated
Louisville, Kentucky

"Black Leaf 40"
40% Nicotine



POULTRY SUPPLIES—Concluded

POULTRY SUPPLIES—Continued

Illinois Supply Co.
Aurora, Ill.
Jacobus, M. R.
New York City, N. Y.
James Mfg. Co.
Ft. Atkinson, Wis.
Keipper Cooping Co.
Milwaukee, Wis.
Klein-Lambert Co.
Blue Island, Ill.
Lee Co., Geo. H.
Omaha, Neb.
Liberty Marvel Co.
Philadelphia, Pa.
Metcalf & Son, Inc.
Syracuse, N. Y.
Michigan Wire Goods Co.
Niles, Mich.
(See Adv. Index Page 178)
Miller Co., J. W.
Rockford, Ill.
Mit-Shel Stamping Mfg. Co.
Quincy, Ill.
National Poultry Band Co.
Newport, Ky.
Oakes Mfg. Co.
Tipton, Ind.
Ohio Rake Co.
Dayton, Ohio
O. K. Co.
New York, N. Y.
Parke, Davis & Co.
Detroit, Mich.
Pearson-Ferguson Co.
Kansas City, Mo.
Perfection Mfg. Co.
Monmouth, Ill.
Pratt Food Co.
Philadelphia, Pa.
Putnam, I.
Elmira, N. Y.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Reliable Incubator & Brooder Co.
Quincy, Ill.
Rose Seed Co.
Clarksdale, Miss.
Scarlett & Co., Wm. G.
Baltimore, Md.

Scott Co., I. W.
Pittsburgh, Pa.
Simplex Brooder Stove Co.
Grand Rapids, Mich.
(See Adv. Index Page 178)
Smith-Conklin Co.
Binghamton, N. Y.
Standard Chemical Mfg. Co.
Omaha, Neb.
Supto Products Co.
Kansas City, Mo.
Universal Products Sales Co.
New York, N. Y.
Thompson & Sons, O. E.
Ypsilanti, Mich.
Von Damm, F. H.
Brooklyn, N. Y.
Wood & Sons, T. W.
Richmond, Va.

SODIUM FLUORIDE

C-A Wood Preserver Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Carbolineum Wood Preserving Co.
Milwaukee, Wis.
Germo Mfg. Co.
St. Louis, Mo.

TOBACCO POWDER

Uniform Products Co.
Lancaster, Pa.

WORM MEDICINE

Germo Mfg. Co.
St. Louis, Mo.
Long Emulsion Co.
Terre Haute, Ind.
(See Adv. Index Page 178)
Merck & Co., Inc.
Rahway, N. J.
Pratt Food Co.
Philadelphia, Pa.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Vitone Mineral Co.
Lancaster, Pa.

SPRAYERS AND SPRAY MATERIALS

(Insecticides and Fungicides)

ANIMAL DIPS

Bourbon Remedy Co.
Lexington, Ky.
Carbola Chemical Co.
Long Island City, N. Y.
Chipman Chemical Engineering Co.
Bound Brook, N. J.
Conkey Co., G. E.
Cleveland, Ohio
Germo Mfg. Co.
St. Louis, Mo.
Good, Inc., James
Philadelphia, Pa.
Lee Co., Geo. H.
Omaha, Neb.
LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
Lewis Co., G. B.
Watertown, Wis.
Pratt Food Co.
Philadelphia, Pa.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Sherwin-Williams Co.
Cleveland, Ohio
Tobacco By-Products & Chem. Corp.
Louisville, Ky.
(See Adv. Index Page 178)

Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)

CROW REPELLENTS

Cedar Hill Formula Co.
New Britain, Conn.
Good, Inc., James
Philadelphia, Pa.
Scott Co., I. W.
Pittsburgh, Pa.

DUSTERS

Bean Spray Pump Co.
Lansing, Mich.
Brown Co., E. C.
Rochester, N. Y.
(See Adv. Index Page 178)
California Sprayer Co.
Los Angeles Calif.
Dobbins Mfg. Co.
North St. Paul, Minn.
(See Adv. Index Page 178)
Dust Sprayer Mfg. Co.
Kansas City, Mo.
Eureka Planter Co., Ltd.
Woodstock, Ont., Cana
Feeny Manufacturing Co.
Muncie, Ind.

These Nationally-Known Products of

Andrew Wilson
INC.

SHOULD BE IN ALL CATALOGS!



Trade Mark Registered

Recommended by the
officers of the Gar-
den Club of America.

WILSON'S O. K. PLANT SPRAY

A harmless, exceptionally effective insecticide for flowers, shrubs, evergreens, etc. Used by florists and estate superintendents everywhere.

½ pint	\$ 0.40
1 quart	1.00
1 gallon	3.00
5 gallons	12.00
10 gallons	20.00
25 gallon drums	50.00
50 gallon drums	90.00



Mix with water and
sprinkle. One good
application a year
sufficient.

WILSON'S WEED KILLER

Kills all weeds, vines, poison ivy, etc. Easy to
apply, inexpensive and clean.

1 gallon	\$ 2.00
5 gallons	8.00
10 gallons	15.00
25 gallon drums	30.00
50 gallon drums	50.00



Mixes easily in cold
water—will not burn
the hands or face.

WILSON'S SCALE-O

Scale-O, a dormant spray, will kill scale insects
and eggs—also Aphis eggs, even in cold weather.
Invaluable for the grower of fruit trees.

1 quart cans	\$ 0.75
1 gallon cans	2.00
5 gallon cans	9.00
10 gallon cans	15.00
30 gallon half drums	33.00
50 gallon drums	50.00

Send for discount sheets.

Andrew Wilson
INC.

MANUFACTURERS OF

Insecticides—Fertilizers—Rhody-Life—Disinfectants

SPRINGFIELD

::

NEW JERSEY

SPRAYERS AND SPRAY MATERIALS—Continued

Dusters—Continued

- Hardie Mfg. Co.
Hudson, Mich.
- Houchin Co., Thos. W.
Jersey City, N. J.
- Iron King Implement Co.
Madison, Ohio
- Levio, P. E.
Vineland, N. J.
- Morse & Co., C. C.
San Francisco, Cal.
(See Adv. Index Page 178)
- Niagara Sprayer Co.
Middleport, N. Y.
- Peerless Dust Gun Co.
Cleveland, Ohio
(See Adv. Index Page 178)
- Potato Implement Co.
Traverse City, Mich.
- Sherwin-Williams Co.
Cleveland, Ohio
- Smith & Co., Inc., D. B.
Utica, N. Y.
(See Adv. Index Page 178)
- Utility Sprayer Co.
Minneapolis, Minn.

FLY REPELLENTS

- Allaire, Woodward & Co.
Peoria, Ill.
- Allen Mfg. Co., H. E.
Carthage, N. Y.
- Colonial Chemical Co.
Reading, Pa.
- Conkey Co., G. E.
Cleveland, Ohio
- Germo Mfg. Co.
St. Louis, Mo.
- Good, Inc., James
Philadelphia, Pa.
- LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
- Pratt Food Co.
Philadelphia, Pa.
- Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
- Sherwin-Williams Co.
Cleveland, Ohio
- Smith & Co., Inc., D. B.
Utica, N. Y.
(See Adv. Index Page 178)
- Tanglefoot Co., The
Grand Rapids, Mich.
- Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)

FUMIGANTS

- American Cyanamid Co.
New York City, N. Y.
- Douglas Chemical & Supply Co.
Kansas City, Mo.
(See Adv. Index Page 178)
- Good, Inc., James
Philadelphia, Pa.
- Interstate Chem. Co.
Jersey City, N. J.
- LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
- Nicotine Mfg. Co.
St. Louis, Mo.
- Perth Amboy Chemical Works
New York City, N. Y.
- Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
- Tobacco By-Products & Chem. Co.
Louisville, Ky.
(See Adv. Index Page 178)
- Uniform Products Co.
Lancaster, Pa.

FUNGICIDES

- Acme White Lead & Color Works
Detroit, Mich.
- American Cyanamid Co.
New York City, N. Y.
- Aphine Mfg. Co.
Madison, N. J.
- Bawker Chemical Co.
New York City, N. Y.
- Bayer-Semesan Co., Inc. (Disinfectants)
New York, N. Y.
(See Adv. Index Page 178)
- Carbola Chemical Co.
Long Island City, N. Y.
- Chipman Chem. Engineer Co.
Bound Brook, N. J.
- Devoe & Reynolds Co.
Chicago, Ill.
- General Chemical Co.
New York, N. Y.
- Good, Inc., James
Philadelphia, Pa.
- Grasselli Chemical Co.
Cleveland, Ohio
- Hammonds Paint & Slug Shot Works
Beacon, N. Y.
- Interstate Chemical Co.
Jersey City, N. J.
- Leggatt & Bro., Inc.
% Interstate Chemical Co.
Jersey City, N. J.
- Nitrate Agencies Co.
Bayonne, N. J.
- Pratt Co., B. G.
New York City, N. Y.
- Sherwin-Williams Co.
Cleveland, Ohio
- Stumpp & Walter Co.
New York City, N. Y.
(See Adv. Index Page 178)
- Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)

INSECTICIDES

The following firms manufacture only plant insecticides except where otherwise noted:

- Acme White Lead & Color Works
Detroit, Mich.
- American Cyanamid Co.
New York City, N. Y.
- Ansbacher Insecticide Co.
New York City, N. Y.
- Aphine Mfg. Co.
Madison, N. J.
- Blaauw, John
Tacoma, Wash.
- Bon Arbor Chemical Co.
Paterson, N. J.
- Botanical Mfg. Co.
Philadelphia, Pa.
- Boundary Chemical Co.
Liverpool, England
- Bourbon Remedy Co. (also animal)
Lexington, Ky.
- Bowker Insecticide Co.
Baltimore, Md.
- Calif. Spray-Chemical Co.
New York City, N. Y.
(See Adv. Index Page 178)
- C-A Wood Preserver Co. (Animal)
St. Louis, Mo.
(See Adv. Index Page 178)
- Carbola Chemical Co. (Animal)
Long Island City, N. Y.
- Carbolineum Wood Preserving Co.
(Animal)
Milwaukee, Wis.
- Carco Spray Co., Inc.
Tacoma, Wash.
- Chipman Chemical Engineering Co.
Bound Brook, N. J.

CERESAN
SEMESAN JR.
SEMESAN
SEMESAN BEL
NU-GREEN

5

Profit Products For Seed Dealers



Every seed customer you have is a customer for Du Bay Seed Disinfectants as well. Why? Because there yet exists no practical means of knowing whether or not dangerous fungous diseases exist on the seed. Farmers, market gardeners, florists and amateurs are turning to seed disinfectants as a cheap, effective form of disease insurance. Sell them seed disinfectants when you sell them seeds.

SEED DISINFECTANTS

Sales Aids

Extensive advertising campaigns in state and national farm publications reach practically every prospect in the sections which grow 97% of all the wheat; 94% of all the oats; 98% of all the barley; 74% of all the corn and 78% of all the potatoes grown in the U. S.

Free Illustrated Booklets
 Catalog Copy
 Newspaper Electros
 Moving Pictures
 Movie Slides
 Window Displays
 Sales Letters
 Sales Information Bulletins
 Radio Talks

Ceresan offers unlimited possibilities since its use as an easily applied dust is effective against the smuts of wheat, oats, barley, rye and sorghum, diseases which cause millions of dollars' loss.

Semesan Jr. is used by farmers as an effective means of protecting seed corn from rotting in the ground. It controls corn root rot diseases and generally increases yields, at an acre cost of only 2½c.

Semesan Bel offers potato growers ease of application by instantaneous dip treatment, freedom from injury to the seed piece, protection against seed-borne diseases, and generally increased yields.

Semesan costs only ¼c to 1c per pound of flower and vegetable seed and may be applied in dust or liquid form.

Nu-Green is a combination disinfectant and stimulator for the Brown Patch disease of golf greens.

Write for full details of this profitable side line:

BAYER-SEMESAN CO., INC.

105 Hudson Street

New York, N. Y.

SPRAYERS AND SPRAY MATERIALS—Continued

INSECTICIDES—Continued

G. E. Conkey Co. (Animal)
Cleveland, Ohio
Cook & Co., Geo. C.
New York City, N. Y.
Daigger & Co., A.
Chicago, Ill.
Devoe & Reynolds
Chicago, Ill.
Douglas Chemical & Supply Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Dow Chemical Co.
Midland, Mich.
Enoz Chemical Co.
Chicago, Ill.
Felix-Girard Co., Inc.
Minneapolis, Minn.
Fertall Co.
Newark, N. J.
Friedman Tobacco Products Corp.
York, Pa.
Garden Chemical Co.
New York City, N. Y.
General Basic Products Co.
Seattle, Wash.
General Chemical Co.
New York City, N. Y.
Glidden Co., The
Cleveland, Ohio
Golden State Milk Products Co.
San Francisco, Calif.
Golden States Sales Corp.
New York, N. Y.
Good, Inc., James
Philadelphia, Pa.
Grasselli Chemical Co.
Cleveland, Ohio
Hammond's Paint & Slug Shot Works
Beacon, N. Y.
Hempstead, Earl L.
Bloomington, Ill.
Home Products, Inc.
Rahway, N. J.
Horn Co., A. C.
Long Island City, N. Y.
Interstate Chemical Co.
Jersey City, N. J.
Keeling & Walker, Ltd.
London, England
Klein-Lambert Co. (Also Animal)
Blue Island, Ill.
LeGear Medicine Co., Dr. L. D. (Animal)
St. Louis, Mo.
Leggatt & Bro., Inc.
% Interstate Chemical Co.
Jersey City, N. J.
Lemon Oil Co.
Baltimore, Md.
McCormick & Co., Inc.
Baltimore, Md.
(See Adv. Index Page 178)
McLaughlin Gormley King & Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Modern Products Corp.
Chicago, Ill.
National Plant Food Co.
Eau Claire, Wis.
Niagara Sprayer Co.
Middleport, N. Y.
Nico Dust Mfg. Co.
Los Angeles, Calif.
Nicotine Mfg. Co.
St. Louis, Mo.
Nitrate Agencies Co.
Bayonne, N. J.
Perfection Chemical Co.
Flushing, N. Y.
Perth Amboy Chemical Works
New York City, N. Y.
Potash-Marl, Inc.
New York City, N. Y.
Powell & Co., Inc., John
New York City, N. Y.

Pratt Co., B. G.
New York City, N. Y.
Pratt Food Co. (Animal)
Philadelphia, Pa.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Rice, J. H.
Ashtabula, Ohio
Shepard Laboratories
Council Bluffs, Iowa
(See Adv. Index Page 178)
Sherwin-Williams Co.
Cleveland, Ohio
Smith & Co., Inc., D. B.
Utica, N. Y.
(See Adv. Index Page 178)
Sporicide Chemical Co.
Atlanta, N. Y.
Stanley Jordan & Co.
New York City, N. Y.
(See Adv. Index Page 178)
Sunset Sales Co.
Tacoma, Wash.
Tobacco By-Products & Chemical Corp.
Louisville, Ky. (Also Animal)
(See Adv. Index Page 178)
Uniform Products Co. (Also Animal)
Lancaster, Pa.
Vigor Co.
Fostoria, Ohio
Virginia-Carolina Chemical Corp.
Richmond, Va.
(See Adv. Index Page 178)
Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)

MOTH KILLERS

Allaire, Woodward & Co.
Peoria, Ill.
Douglas Chemical & Supply Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Enoz Chemical Co.
Chicago, Ill.
Gateway Chemical Co.
Kansas City, Mo.
Good, Inc., James
Philadelphia, Pa.
Home Products, Inc.
Rahway, N. J.
Taylor Chemical Co.
New York City, N. Y.
Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)

PEST EXTERMINATORS

(Rats, Etc.)

Allen Mfg. Co., Inc., H. E.
Carthage, N. Y.
American Cyanamid Co.
New York City, N. Y.
Automatic Trap Co.
Chicago, Ill.
Bon Arbor Chemical Co.
Paterson, N. J.
Botanical Mfg. Co.
Philadelphia, Pa.
Carbola Chemical Co.
Long Island City, N. Y.
Chipman Chem. Engineering Co.
Bound Brook, N. J.
Douglas Chemical & Supply Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Dugan, Herbert F.
San Francisco, Calif.
Enoz Chemical Co.
Chicago, Ill.
Felix, Girard & Co., Inc.
Minneapolis, Minn.



meets the demand for:—

—a sure, quick killer of plant insects—both chewing and sucking varieties;

—a **safe** insecticide . . . harmless to man, animals, birds and plants;

—**pleasant** to use, no disagreeable odors;

—**economical**—dilutes 1 to 800 for aphids.

Nationally advertised; sales growing by leaps and bounds; a liberal profit margin for dealers. Write for our proposition.

McLAUGHLIN GORMLEY KING CO.

1728 S. E. Fifth St.

Minneapolis, Minn.

No dealer can afford to be without

RED ARROW INSECT SPRAY BEE BRAND INSECT POWDER

Non-poisonous — Odorless — Non-inflammable — Non-staining

Nearest perfection in war against insects affecting

Flower and Vegetable Garden

Truck Crop

Greenhouses

Small Fruits

Orchards

Ornamentals

Home

Kennel

Dairy and Stock Farms

Poultry House

Literature, Sample, Testimonials and Quotations on Application

McCORMICK & CO., INC., Manufacturing Chemists

Pioneers in Pyrethrum Products

BALTIMORE

MARYLAND

SAVE TIME AND MONEY

by using these seed germination pads. They can conveniently be used in any make of machine. The size of the pads are 3x3", each having 100 indentations.

Why Count the Seeds?

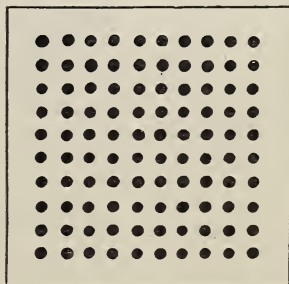
The indentations of these pads are correct for average size seeds such as Red Clover and all seeds of similar size. If it is desirable to have a blotter pad on top, they can be used to advantage in that way. Orders for thousands of these pads have already been received.

They are SEEDBURD Quality

The cost is reasonable. Samples and prices on request.

The Seed Trade Reporting Bureau

1018 S. Wabash Ave., Chicago



SPRAYERS AND SPRAY MATERIALS—Continued

Pest Exterminators—Continued

Good, Inc., Jas.
Philadelphia, Pa.
LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
Merchants Drug Co.
Easton, Md.
Modern Products Corporation
Chicago, Ill.
Quisenberry-Hobbs Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Rat Bis-Kit Co.
Springfield, Ohio
Reardon Laboratories, Inc., W. G.
Port Chester, N. Y.
(See Adv. Index Page 178)
Stearns' Electric Paste
Chicago, Ill.
Stimulant Laboratories, Inc.
Long Island City, N. Y.
(See Adv. Index Page 178)
Tanglefoot Co., The
Grand Rapids, Mich.
Virus, Ltd., R. R.
New York City, N. Y.
Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)
X-Termo Products, Inc.
Milwaukee, Wis.

SEED DISINFECTANTS

Bayer-Semesan Co., Inc.
New York, N. Y.
(See Adv. Index Page 178)

SPRAYERS

Alliance Mfg. Co., The
Alliance, Ohio
Armstrong Mfg. Co.
Huntington, W. Va.
Barnes Mfg. Co.
Mansfield, Ohio
Bateman Co., Fred H.
Philadelphia, Pa.
Bean Spray Pump Co.
Lansing, Mich.
Brower Mfg. Co.
Quincy, Ill.
Brown Co., E. C.
Rochester, N. Y.
(See Adv. Index Page 178)
Campbell-Hausfeld Co., The
Harrison, Ohio
Cincinnati Screw Co.
Cincinnati, Ohio
Crown Mfg. Co.
Phelps, N. Y.
Deming Co.
Salem, Ohio
Dobbins Mfg. Co., The
N. St. Paul, Minn.
(See Adv. Index Page 178)

Eureka Mower Co.
Utica, N. Y.
Feeny Mfg. Co.
Muncie, Ind.
Field Force Pump Co.
Elmira, N. Y.
Friend Mfg. Co.
Gasport, N. Y.
Goulds Mfg. Co.
Seneca Falls, N. Y.
Hardie Mfg. Co.
Hudson, Mich.
Hayes Pump & Planter Co.
Hoeft & Co., Inc.
North Chicago, Ill.
(See Adv. Index Page 178)
Galva, Ill.
Hudson Mfg. Co.
Minneapolis, Minn.
(See Adv. Index Page 178)
Humphreys Mfg. Co.
Mansfield, Ohio
Iron King Implement Co.
Madison, Ohio
Lenox Misty Sprayer Mfg. Co., The
New York, N. Y.
Morrill & Morley Mfg. Co.
Benton Harbor, Mich.
Myers & Bro. Co., The F. E.
Ashland, Ohio
(See Adv. Index Page 178)
Niagara Sprayer Co.
Middleport, N. Y.
Peerless Dust Gun Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Potato Implement Co.
Traverse City, Mich.
Smith & Co., D. B.
Utica, N. Y.
(See Adv. Index Page 178)
Utility Sprayer Co.
Minneapolis, Minn.

WEED DESTROYERS

Atlas Preservative Co.
New York City, N. Y.
Bentley, Ltd., Jos.
Hull, England
Bon Arbor Chemical Co.
Paterson, N. J.
Boundary Chemical Co.
Liverpool, England
Chipman Chemical Engineering Co., Inc.
Bound Brook, N. J.
Good, Inc., James
Philadelphia, Pa.
Interstate Chem. Co.
Jersey City, N. J.
Milwaukee Paper Pulley Works
Milwaukee, Wis.
Sowrite, Inc.
New York, N. Y.
Wilson, Inc., Andrew
Springfield, N. J.
(See Adv. Index Page 178)

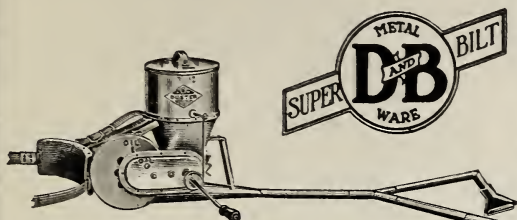
STOCK FOODS AND REMEDIES

STOCK FOODS

American Dry Milk Institute
Chicago, Ill.
American Milling Co.
Peoria, Ill.
Blatchford Calf Meal Co.
Waukegan, Ill.
Casco Milling Co.
Omaha, Neb.
Clover Leaf Milling Co.
Buffalo, N. Y.
Conkey Co., The G. E.
Cleveland, Ohio
Corn Products Refining Co.
New York, N. Y.

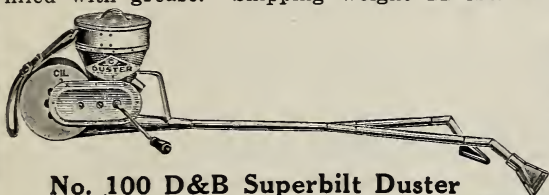
Curtin Company, George L.
New York, N. Y.
Dacotah Seed Co.
Bismarck, N. D.
(See Adv. Index Page 178)
Dairymen's Ass'n
Lyndon, Vt.
Douglas Co.
Cedar Rapids, Ia.
Hales & Hunter Co.
Chicago, Ill.
Hardeman-King Co.
Amarillo, Texas
International Sugar Feed Co.
Minneapolis, Minn.

D & B SUPERBILT SPRAYERS AND DUSTERS



No. 200 D&B Superbilt Duster

Capacity 5 to 10 lbs., depending upon powder used. Complete with fittings for one or two rows. Steel cut gears enclosed in case filled with grease. Shipping weight 22 lbs.



No. 100 D&B Superbilt Duster

Of same general construction as No. 200. Capacity 3 to 6 lbs., depending on powder used. Equipped for one or two rows. Shipping weight 14½ lbs.



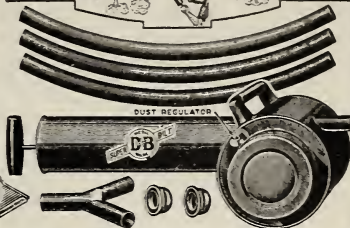
Superbilt Sprayer

No. 399G—Galv. Tank.
No. 399B—Brass Tank.
Capacity 4 gallons. Shipping weight 12 lbs. Includes 24" Brass Extension and Universal Nozzle.



Rival Sprayer

No. 288G—Galv. Tank.
No. 288B—Brass Tank.
Capacity 3½ gallons. Shipping weight 10 lbs. Includes 20" Extension.



No. 120 Dandy Duster

Will do more work in less time than possible with any but higher priced dusters. Equipped with fittings for many varied operations. Packed two to the carton. Shipping weight 8 lbs.



No. 130 Little Wonder Duster

Equipped with 24 inches of extension and angle nozzle. Packed one dozen to the carton. Shipping weight 16½ lbs.



Gardener Sprayer

No. 4G—Galv. Tank.
No. 4B—Brass Tank.
Capacity 2 gals. Shipping weight 7 lbs. Includes 20" Extension.

THE DOBBINS MFG. CO.
NORTH ST. PAUL, MINN.

STOCK FOODS AND REMEDIES**Stock foods—Continued**

Nowak Milling Corporation
Buffalo, N. Y.
Peters Mill Co., M. C.
Omaha, Neb.
Pratt Food Co.
Philadelphia, Pa.
Quaker Oats Co.
Chicago, Ill.
Ralston Purina Co.
St. Louis, Mo.
Security Calf Food Co.
Minneapolis, Minn.
Steel Co., The F. R.
Chicago, Ill.
Universal Products Sales Co.
New York, N. Y.
Vitality Mills
Chicago, Ill.
Ubiko Milling Co.
Cincinnati, Ohio
Wilson & Co., Inc.
Chicago, Ill.

Carey Salt Co.
Hutchinson, Kan.
Conkey, Co., The G. E.
Cleveland, Ohio
Dairymen's Ass'n
Lyndon, Vt.
Fell Mfg. Co.
Cleveland, Ohio
Fleming Bros., Chemists
Chicago, Ill.
Glover Co., Inc., H. Clay
New York, N. Y.
Hess & Clark, Dr.
Ashland, Ohio
Lee Co., Geo. H.
Omaha, Neb.
LeGear Medicine Co., Dr. L. D.
St. Louis, Mo.
Magic Food Co.
Chattanooga, Tenn.
Modern Products Corp.
Chicago, Ill.
Pratt Food Co.
Philadelphia, Pa.
Sherwin-Williams
Cleveland, Ohio
Standard Chemical Mfg. Co.
Omaha, Neb.
Uniform Products Co.
Lancaster, Pa.

STOCK REMEDIES

Bee Dee Stock Medicine Co.
Chattanooga, Tenn.
Bourbon Remedy Co.
Lexington, Ky.
Carbola Chemical Co.
Long Island City, N. Y.

MISCELLANEOUS SIDE LINES**ADVERTISING SPECIALTIES—
WOOD**

Root Co., A. I.
Medina, Ohio

BEE SUPPLIES

Bell's, Ltd.
Prince Albert, Saskatchewan
Dadant & Sons
Hamilton, Ill.
Kilgore Seed Co.
Plant City, Fla.
Lewis Co., G. B.
Watertown, Wis.
Root Co., A. I.
Medina, Ohio
Scott Co., I. W.
Pittsburgh, Pa.

**BOOKS ON FARMING AND
GARDENING**

DeLaMare Co., Inc., A. T.
New York City, N. Y.
Doubleday, Page & Co.
Garden City, N. Y.
Lippincott Co., J. B.
Philadelphia, Pa.
Little, Brown & Co.
Boston, Mass.
MacMillan Co., The
New York City, N. Y.
Orange Judd Publ. Co., Inc.
New York City, N. Y.
Webb Publishing Co.
St. Paul, Minn.

BOWLS—BULB

Hews & Co., Inc., A. H.
Syracuse, N. Y.
Paducah Pottery Co.
Paducah, Ky.
Roseville Pottery Co.
Zanesville, Ohio
Syracuse Pottery, Inc.
Syracuse, N. Y.

Zane Pottery Co.
So. Zanesville, Ohio

FLOWERS—ARTIFICIAL

Adler-Jones Co.
Chicago, Ill.

FEATHER FLOWERS

DeWitt Sisters
Battle Creek, Mich.

GLOBES (GAZING)

American Thermo-Ware Co., Inc.
New York, N. Y.
(See Adv. Index Page 178)

HANGING BASKETS

Hews & Co., Inc., A. H.
Syracuse, N. Y.
Miller & Doing
Brooklyn, N. Y.
Raedleln Basket Co.
Chicago, Ill.
Savo Mfg. Co.
Chicago, Ill.
Syracuse Pottery, Inc.
Syracuse, N. Y.

MUSHROOM SPAWN

American Spawn Co.
St. Paul, Minn.
Michell Co., Henry F.
Philadelphia, Pa.
Niles Mushroom Co.
Niles, Mich.

NOVELTIES

N. Shure Company
Chicago, Ill.

SOIL TESTERS

Dickinson Co., The Albert
Chicago, Ill.
Earp Laboratories
Bloomfield, N. J.



COTTON BAGS

ALL TYPES

*We have very attractive prices to offer.
Kindly write for our prices and samples.*

MAIN OFFICE
AMES BAG MACHINE CO.

1991 E. 66th St., Cleveland, Ohio

PLANTS

Cleveland, Ohio Selma, Alabama
Mentor, Ohio

PROTECT YOUR SEED SHIPMENTS

The Porter Safety Seal—"The Seal That Seals"

Gives positive assurance against adulteration or substitution. Makes it possible to attach analysis or shipping tags with one operation at the time of sealing.

Is inexpensive; will not get out of order; is simple and easy to operate.

Meets every requirement of the P. O. Dept. and is universally used by banks for sealing shipments of coin and currency.

The Porter Safety Seal is the invention of Capt. Thos. I. Porter of the U. S. Secret Service. It consists of a piece of lead with a steel pin firmly embedded in it, and has four parallel holes through which is threaded a



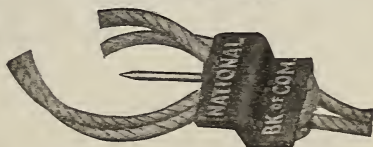
Seal on
Neck of Bag

stout cord. With one simple operation the pin is forced into folded neck of bag and cord is pulled tight. The seal is compressed, imprinting your name and address and crimping seal, thus sealing the bag securely in such a manner that it cannot be opened without destroying the seal or leaving unmistakable evidence of tampering.

Sample sealed bag and full information sent on request.



The Porter Safety Seal before and
after being used



Porter Safety Seal Co. 157 West Harrison St., CHICAGO

MISCELLANEOUS SIDE LINES—Continued

TREE PROTECTION

Owens Co., J. L.
Minneapolis, Minn.
Sheffield Mfg. Co.
Burr Oak, Mich.
Tanglefoot Co., The
Grand Rapids, Mich.

XMAS GREENS

Bitsche Seed & Nursery Co. (Mistletoe)
Chickasha, Okla.
Chesmore Seed Co.
St. Joseph, Mo.
Conwell, Inc., H. Ernest
Milton, Delaware

Hofert, J.
Los Angeles, Cal.
Jones, The Holly Wreath Man
Milton, Dela.
Neilson, Knud
Evergreen, Ala.
Oregon Holly & Evergreen Co.
Portland, Ore.
Poehlman Bros.
Chicago, Ill.
Robbins, E. C.
Pineola, N. C.

XMAS TREE HOLDERS

Dicks Stamping Co., Inc.
Buffalo, N. Y.

SEEDSMEN'S SUPPLIES

ACCOUNTANTS AND ACCOUNTING SYSTEMS

Ernst & Ernst
New York, N. Y.

ADV. FOR SEEDSMEN

Benton Review Shop
Fowler, Ind.
DeLaMare Co., Inc., A. T.
New York, N. Y.
Hartland Adv. Service
New York, N. Y.
Hurley, D. C.
Boston, Mass.
Lau Colortype Co., Max
Chicago, Ill.
Karle Lithographic Co.
Rochester, N. Y.
McFarland Publicity Service
Harrisburg, Pa.
Manz Engraving Co.
Chicago, Ill.
Morse Co., A. B.
St. Joseph, Mich.
Newell, R. B.
Chicago, Ill.
Rochester Litho. Co.
Rochester, N. Y.

BAGS—COTTON OR BURLAP

Ames Bag Machine Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Bemis Bro. Bag Co.
St. Louis, Mo.
(See Adv. Index Page 178)
Bosworth Co., M. M.
Memphis, Tenn.
Chase Bag Co.
Cleveland, Ohio
Chatfield & Wood Sack Co.
Cincinnati, Ohio
Cleveland Buckram & Bag Co.
Cleveland, Ohio
(See Adv. Index Page 178)
Field & Co., Marshall
Chicago, Ill.
Messinger Paper Co.
Chicago, Ill.
Morrison & Risman Co.
Buffalo, N. Y.
Southern Cotton Mills Agency
Baltimore, Md.
Western Bag Co.
Nashville, Tenn.

BAGS—PAPER

Bates Valve Bag Co., R. P.
Chicago, Ill.
Bemis Bro. Bag Co.
St. Louis, Mo.
(See Adv. Index Page 178)

Brown Bag Filling Machine Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
Chase Bag Co.
Cleveland, Ohio
International Paper Co.
New York, N. Y.
(See Adv. Index Page 178)
Messinger Paper Co.
Chicago, Ill.
Miller Brothers Company
Newark, N. J.
Stone & Forsyth Co.
Boston, Mass.

BAG CLOSING MACHINES

Bates Valve Bag Co., R. P.
Chicago, Ill.
Brown Bag Filling Machine Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
Savage Co., Inc., W. J.
Knoxville, Tenn.
Union Special Machine Co.
Chicago, Ill.

BAG FILLING MACHINES

Brown Bag Filling Machine Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
National Packaging Machinery Co.
Jamaica Plain, Boston, Mass.
Stokes & Smith Co., The
Philadelphia, Pa.
Union Special Machine Co.
Chicago, Ill.

BAG HOLDERS

Gump Co., B. F.
Chicago, Ill.
Strong Scott Co.
Minneapolis, Minn.

BAG PILERS—CONVEYORS

Dow Wire & Iron Works
Louisville, Ky.
Howes Co., S.
Silver Creek, N. Y.
Revolator Co.
Jersey City, N. J.

BAG SEALS

Bates Valve Bag Co., R. P.
Chicago, Ill.
Porter Safety Seal Co.
Chicago, Ill.
(See Adv. Index Page 178)

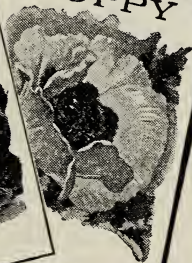
LITHOGRAPHED SEED PACKETS

CARTONS HANGERS
CATALOG COVERS

CABBAGE



POPPY



READY FOR
IMMEDIATE DELIVERY

GALLOWAY
LITHOGRAPHING CO.
SAN FRANCISCO, CAL.

Write us for samples



When seed bags wear out, your season's profits suffer. Protect your profits this year. Buy genuine Bemis A's to start with and get twice as many round trips out of every bag. Bemis A Seamless Seed Bags are extra heavy, woven in our own mills from carefully selected cotton. No seams to rip. The exclusive Bemis over-cast bottom prevents raveling. Full 16-oz. weight guaranteed.

See your dealer early, for Bemis A's are in strong demand. If he can't supply you, write our nearest factory.

BEMIS BRO. BAG CO.

Quick Shipment From These Bemis Factories

St. Louis
Minneapolis
Omaha
New Orleans
San Francisco

Indianapolis
Memphis
Kansas City
Seattle
Ware Shoals, S. C.

Houston
Brooklyn
Buffalo
Wichita
Winnipeg

LR1085

Say
BEMIS
A

*The Standard Seamless
SEED BAG of America*

SEEDSMEN'S SUPPLIES—Continued

BAG STITCHING MACHINES

Union Special Machine Co.
Chicago, Ill.

BAG TRIERS

Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)

BEAN PICKERS

Ferrell & Co., A. T.
Saginaw, Mich.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
Judson Michigan Co.
Detroit, Mich.

BOXES—PARCEL POST

Hinde & Dauch Paper Co.
Sandusky, Ohio
Stone & Forsyth Co.
Boston, Mass.

CARTONS—PAPER

Galloway Lithographing Co.
San Francisco, Calif.
(See Adv. Index Page 178)
Gereke Allen Carton Co.
St. Louis, Mo.
Heinrich, Inc., John A.
Minneapolis, Minn.
(See Adv. Index Page 178)
Sefton Mfg. Co.
Chicago, Ill.
Stecher Lithographic Co.
Rochester, N. Y.
(See Adv. Index Page 178)
Stone & Forsyth Co.
Boston, Mass.
Weaver Mailing Env. & Box Co.
Philadelphia, Pa.
Webster Co., Mel L.
Independence, Ia.

CARTONS—PRINTED

Galloway Lithographing Co.
San Francisco, Calif.
(See Adv. Index Page 178)
Genesee Valley Lithograph Co.
Rochester, N. Y.
(See Adv. Index Page 178)
Karle Lithographic Co.
Rochester, N. Y.
Miller Brothers Company
Newark, N. J.
Sefton Mfg. Co.
Chicago, Ill.
Stecher Lithographic Co.
Rochester, N. Y.
(See Adv. Index Page 178)

CATALOG COLORED COVERS

Campbell Printing Co.
Des Moines, Iowa
(See Adv. Index Page 178)
Christy Color Engraving & Ptg. Co.
Rochester, N. Y.
Excelsior Printing Co.
Chicago, Ill.
Galloway Lithographing Co.
San Francisco, Calif.
(See Adv. Index Page 178)
Genesee Press, The
Rochester, N. Y.
Genesee Valley Lithograph Co.
Rochester, N. Y.
(See Adv. Index Page 178)
Karle Lithographic Co.
Rochester, N. Y.
Lau Colortype Co., Max
Chicago, Ill.
McFarland Co., J. Horace
Harrisburg, Pa.

Magill-Weinsheimer Co.
Chicago, Ill.
Merchants Litho. Co.
Chicago, Ill.
Morse Co., A. B.
St. Joseph, Mich.
Printing Products Corporation
Chicago, Ill.
Quality Print
Shelbyville, Ind.
Rimes Illustrating Co., M. L.
New York, N. Y.
Rochester Lithographing Co.
Rochester, N. Y.
Stecher Lithographing Co.
Rochester, N. Y.
(See Adv. Index Page 178)

CATALOG ILLUSTRATIONS

Campbell Printing Co.
Des Moines, Iowa
(See Adv. Index Page 178)
Galloway Litho. Co., Inc.
San Francisco, Cal.
(See Adv. Index Page 178)
Genesee Press, The
Rochester, N. Y.
Lau Colortype Co., Max
Chicago, Ill.
Lotus Engraving Co.
Atchison, Kans.
McFarland Publicity Service
Harrisburg, Pa.
Magill-Weinsheimer Co.
Chicago, Ill.
Manz Engraving Co.
Chicago, Ill.
Rimes Illustrating Co., M. L.
New York City, N. Y.
Rochester Litho. Co.
Rochester, N. Y.

CATALOG PRINTERS

Benton Review Shop
Fowler, Ind.
Byrd Press, Inc., The Wm.
Richmond, Va.
Campbell Printing Co.
Des Moines, Iowa
(See Adv. Index Page 178)
Combe Printing Co.
St. Joseph, Mo.
Cuneo Co., The
Chicago, Ill.
DeLaMare Co., Inc., A. T.
New York, N. Y.
Excelsior Printing Co.
Chicago, Ill.
Franklin Hudson Publ. Co.
Kansas City, Mo.
Gable Bros. Printing Co.
Brookfield, Ill.
Genesee Press, The
Rochester, N. Y.
Hartland Adv. Service
New York, N. Y.
Karle Lithographic Co.
Rochester, N. Y.
Lau Colortype Co., Max
Chicago, Ill.
McFarland Publicity Service
Harrisburg, Pa.
Magill-Weinsheimer Co.
Chicago, Ill.
Morse Co., A. B.
St. Joseph, Mich.
Plough Printing Co.
Memphis, Tenn.
Printing Products Corp.
Chicago, Ill.
Process Color Printing Co.
Rochester, N. Y.
Rimes Illustrating Co., M. L.
New York, N. Y.
Stevens Printing & Stationery Co., The
Hugh
Jefferson City, Mo.

SEED PACKETS

WE HAVE A FULL LINE OF STOCK IN BOTH
FLOWER AND VEGETABLE PACKETS

Write for samples and prices

CATALOGUE COVERS, BOX LABELS
AND HANGERS

**ORDERS PLACED ON TIME WILL
BE DELIVERED ON TIME**

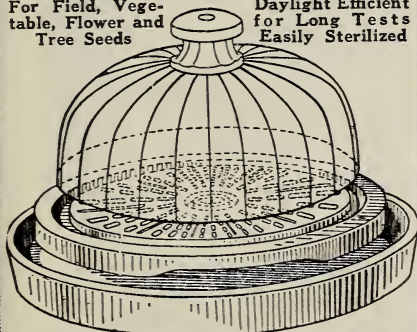
Genesee Valley Lithograph Co.

INCORPORATED
ROCHESTER, NEW YORK

Self-Watering Germinator

For Field, Vegetable, Flower and Tree Seeds

Daylight Efficient for Long Tests Easily Sterilized



Now after much experimenting a reliable and efficient self-moistening germinator is available.

The self-moistening porous disc has divided surface to facilitate counting. There are 10 sections of 10 indentations. The cover is of clear glass and ventilated.

This daylight germinator will attract attention in store, office or display window. More than 100 of these germinators are used by one of the large seed houses. It is guaranteed to be satisfactory. Price \$3.50 each, or \$3.25 in dozen lots, delivered in the United States.

The Seed Trade Reporting Bureau
1018 S. Wabash Ave. Chicago

COLOR!



**That's the dominant
note in advertising today.**

We have never had a customer who discontinued the use of color in printing in a nursery or seed catalog. The unanimous opinion is: "It pays!"

Our collection of fine color plates for stock use is now very large.

Write us about your catalog needs. We can help you.

**CAMPBELL
PRINTING COMPANY**

917 Walnut St.
Des Moines, Iowa

SEEDSMEN'S SUPPLIES—Continued

CLEANING MACHINERY

Burch Corporation, The
Crestline, Ohio
Cleland Mfg. Co.
Minneapolis, Minn.
Eddy Seed Cleaners, Ltd.
Toronto, Canada
Ferrell & Co., A. T.
Saginaw, Mich.
Gravity Grain Grader Co.
Stockton, Cal.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
Johnson & Field Mfg. Co.
Racine, Wis.
Judson Michigan Co.
Detroit, Mich.
Owens Co., J. L.
Minneapolis, Minn.
Rice, W. A.
Jerseyville, Ill.
Sutton, Steele & Steele, Inc.
Dallas, Texas
Twin City Separator Co.
Minneapolis, Minn.

COLOR REPRODUCTIONS FOR
SEEDSMEN AND NURSERYMEN

Genesee Press, The
Rochester, N. Y.
Lau Colortype Co., Max
Chicago, Ill.
Magill-Weinsheimer Co.
Chicago, Ill.
Manz Engraving Co.
Chicago, Ill.
Process Color Printing Co.
Rochester, N. Y.

COMMERCIAL SEED TESTING

Commercial Seed Laboratory
Washington, D. C., and Toledo, O.
International Seed Testing Laboratories
New York, N. Y.
(See Adv. Index Page 178)

CORN GRADERS

Cleland Mfg. Co.
Minneapolis, Minn.
Ferrell & Co., A. T.
Saginaw, Mich.
Howes Co., S.
Silver Creek, N. Y.
Hunnicut Co., Chas.
Wilmington, Ohio
Huntley Mfg. Co.
Brocton, N. Y.
Manson Cambell Co.
Detroit, Mich.
Maroa Mfg. Co.
Maroa, Ill.
Owens Co., J. L.
Minneapolis, Minn.
Richards & Sons, Ross V.
North Manchester, Ind.
Universal Hoist & Mfg. Co.
Cedar Falls, Iowa
(See Adv. Index Page 178)

CORN SHELLERS

Constant Co., B. S.
Bloomington, Ill.
Howes Co., S.
Brocton, N. Y.
Union Iron Works
Decatur, Ill.

CRACKED CORN CLEANERS AND
GRADERS

Cleland Mfg. Co.
Minneapolis, Minn.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
Linkhart Mfg. Co.
Indianapolis, Ind.
Straub Co., A. W.
Philadelphia, Pa.
Universal Hoist & Mfg. Co.
Cedar Falls, Iowa
(See Adv. Index Page 178)

CRUSHERS

Gruendler Pat. Crusher & Pul. Co.
St. Louis, Mo.
Williams Patent Crusher & Pulv. Co.
Chicago, Ill.

DUST COLLECTORS

Day Co., The
Minneapolis, Minn.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.

ENVELOPES

Berkowitz Envelope Co.
Kansas City, Mo.
(See Adv. Index Page 178)
Brown Bag Filling Mach. Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
Eagle Envelope Co.
Chicago, Ill.
Heco Envelope Co.
Chicago, Ill.
Heinrich, Inc., John A.
Minneapolis, Minn.
(See Adv. Index Page 178)
Letalog Mailer Co.
Chicago, Ill.
Weaver Envelope Co.
Philadelphia, Pa.

FEED GRINDERS

Duplex Mill & Mfg. Co.
Springfield, Ohio
Gibson Oat Crusher Co.
Chicago, Ill.
Gruendler Patent Crusher & Pulv. Co.
St. Louis, Mo.
Howes Co., S.
Silver Creek, N. Y.
Linkhart Mfg. Co.
Indianapolis, Ind.
McCarger Mfg. Co., L. B.
North Kansas City, Mo.
Williams Patent Crusher & Pulv. Co.
St. Louis, Mo.

FEED PACKAGING MACHINERY

Ferguson & Co., J. L.
Joliet, Ill.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
National Packaging Machinery Co.
Jamaica Plain, Boston, Mass.
Stokes & Smith Co., The
Philadelphia, Pa.

GERMINATORS

Bridges Mfg. Co.
Bedford, Iowa

**Berkowitz
Envelopes**
*for Every
Seed House and
Nursery
Use*



BERKOWITZ ENVELOPE CO.
KANSAS CITY, MO.

International Seed Testing Laboratories

Park-Murray Building
11 Park Place
NEW YORK CITY

ANALYSIS CONSULTATION ARBITRATION



THE DAVIS "SELF SERVE"

Seed Packet Display Racks either Revolving or Combination Shipping and Display Cases, for the Wholesaler or Retailer, are the neatest, most compact, best built and inexpensive seed packet display fixtures on the market.

Illustrated Catalog on Request

DAVIS METAL FIXTURE CO., P. O. Box 2130, Lansing, Mich.

**WHAT MERCHANDISE
CAN THE SEED DEALER
HANDLE PROFITABLY?**

Ask Seed World Service Dept.

1018 So. Wabash Ave., Chicago

SEEDSMEN'S SUPPLIES—Continued

Germinators—Continued

- Close-To-Nature Co.
Colfax, Iowa
Kny Scheerer Corp. of America
New York City, N. Y.
Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)
Specialty Mfg. Co.
St. Paul, Minn.

GLAZING POINTS

- Dreer, Inc., Henry A.
Philadelphia, Pa.
Metropolitan Material Co.
Brooklyn, N. Y.

GRAIN CLEANERS

- Ferrell & Co., A. T.
Saginaw, Mich.

GREENHOUSES

- American Greenhouse Mfg. Co.
Chicago, Ill.
King Construction Co.
North Tonawanda, N. Y.
Lord & Burnham Co.
Chicago, Ill.
Metropolitan Greenhouses
Brooklyn, N. Y.
Moninger Co., John C.
Chicago, Ill.

HULLERS

- Ferrell & Co., A. T.
Saginaw, Mich.

IRRIGATION SYSTEMS

- Dayton Irrigation Co.
Dayton, Ohio
Jacobs & Co., S.
Brooklyn, N. Y.
Martin Iron Works
Los Angeles, Calif.
Metropolitan Material Co.
Brooklyn, N. Y.
Skinner Irrigation Co.
Troy, Ohio
X. L. Mfg. Co.
Chicago, Ill.

LABORATORY EQUIPMENT

- Huntley Mfg. Co.
Brocton, N. Y.
Kny-Scheerer Corporation of America
New York City, N. Y.
Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)
Specialty Mfg. Co.
St. Paul, Minn.
Torsion Balance Co.
New York City, N. Y.

LEGAL AID

- Bebb, Herbert
Chicago, Ill.
Smith, Curtis Nye
Boston, Mass.

MIXERS—SEED OR FEED

- Burch Corp.
Crestline, Ohio
Gump Co., B. F.
Chicago, Ill.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
Savage Co., W. J.
Knoxville, Tenn.

PACKET FILLING

- Brown Bag Filling Machine Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
National Packaging Machinery Co.
Jamaica Plains, Boston, Mass.

PACKET FILLING MACHINES

- Automatic Packaging Machinery Co.
Nashua, N. H.
Brown Bag Filling Machine Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
Ferguson Co., J. L.
Joliet, Ill.
Hoepner Auto Scale Co.
Chicago, Ill.
Packaging Machinery Co.
Yonkers, N. Y.
Stokes & Smith Co., The
Philadelphia, Pa.

PATENT ATTORNEY

- Scheible, Albert
Chicago, Ill.

PAPER FOR CATALOGS

- Collins Co., A. M.
Philadelphia, Pa.
International Paper Co.
New York, N. Y.
(See Adv. Index Page 178)
Kimberly-Clark Co.
Chicago, Ill.
Quality Print, Inc.
Shelbyville, Ind.
Seaman Paper Co.
Chicago, Ill.

PAPER—MULCH

- International Paper Co.
New York, N. Y.
(See Adv. Index Page 178)

PAPER—WRAPPING

- International Paper Co.
New York, N. Y.
(See Adv. Index Page 178)
Messinger Paper Co.
Chicago, Ill.
Miller-Tompkins & Co.
New York City, N. Y.
Safeback Mills
Boston, Mass.
Stone & Forsyth Co.
Boston, Mass.

POSTERS

- Galloway Lithographing Co., Inc.
San Francisco, Cal.
(See Adv. Index Page 178)
Genesee Valley Lithograph Co.
Rochester, N. Y.
(See Adv. Index Page 178)
Morse Co., A. B.
St. Joseph, Mich.
Quality Print, Inc.
Shelbyville, Ind.
Rimes Illustrating Co., M. L.
New York, N. Y.
Steecher Lithographic Co.
Rochester, N. Y.
(See Adv. Index Page 178)

POULTRY FEED MACHINERY

- Gump Co., B. F.
Chicago, Ill.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
National Packaging Machine Co.
Jamaica Plain, Boston, Mass.

SELL MORE FROM SAMPLES

You know what samples to show. KNICKERBOCKER "Made Right" sample cases provide the modern means to show them most effectively.

Your salesmen, Knickerbocker equipped, will out-sell others lacking this advantage.

Write for our catalog showing many standard cases, or write for information if you have some special idea or plan we can work out for you.

Knickerbocker Case Co.
2327 North Crawford Ave.
CHICAGO, ILLINOIS.
"Made Right" Sample Cases ~ Since 1900



Do you handle Poultry Supplies?

There are numerous NEW DEVELOPMENTS in the poultry industry which should make the Seed Dealer Poultry Dept. more profitable.

For particulars address
Poultry Service Bureau

SEED WORLD

1018 So. Wabash Ave., Chicago

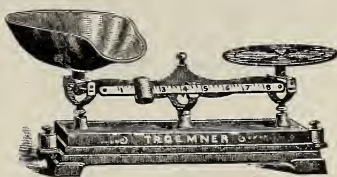


Fig. 39. AGATE SEED SCALE

HENRY TROEMNER

MANUFACTURER

**FINE BALANCES, SCALES,
WEIGHTS FOR TESTING
AND GRADING OF SEED,
GRAIN, ETC.**

Many Types for Many Uses

EST. 1840
CATALOG

911 ARCH ST. PHILA., PA.

SEEDSMEN'S SUPPLIES—Continued

SAMPLE CASES

Hamilton Mfg. Co.
Two Rivers, Wis.
Knickerbocker Case Co.
Chicago, Ill.
(See Adv. Index Page 178)
Lewis Co., G. B.
Watertown, Wis.

SAMPLE PANS

Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)

SCALES—AUTOMATIC

Automatic Weighing Machine Co.
Brooklyn, N. Y.
Exact Weight Scale Co., The
Columbus, Ohio
Ferguson Co., J. L.
Joliet, Ill.
Howe Scale Co.
Chicago, Ill.
Howes Co., S.
Silver Creek, N. Y.
National Packaging Machine Co.
Jamaica Plain, Boston, Mass.
Richardson Scale Co.
Passaic, N. J.
Stokes & Smith Co., The
Philadelphia, Pa.
Toledo Scale Co.
Toledo, Ohio

SCALES—COUNTER OR PLAT-
FORM

Exact Weight Scale Co., The
Columbus, Ohio
Fairbanks, Morse & Co.
Chicago, Ill.
Hoepner Auto. Scale Co.
Chicago, Ill.
Howe Scale Co.
Chicago, Ill.
Jacobs Bros. Co., Inc.
Brooklyn, N. Y.
Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)
Toledo Scale Co.
Toledo, Ohio
Torsion Balance Co.
New York City.
Troemner Co., Henry
Philadelphia, Pa.
(See Adv. Index Page 178)

SCALES—LABORATORY

Kny Scheerer Corp. of America
New York City, N. Y.
Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)
Torsion Balance Co.
New York City, N. Y.

SCARIFIERS

Birdsell Mfg. Co.
South Bend, Ind.
Cleland Mfg. Co.
Minneapolis, Minn.
Dufecto Mfg. Co.
Nevada, Iowa
Eddy Seed Cleaners, Ltd.
Toronto, Canada
Ferrell & Co., A. T.
Saginaw, Mich.
Jensen, P. E.
Nevada, Iowa

SCOOP TRUCKS

Duluth Corrugating & Roofing Co.
Duluth, Minn.

SCREENS

Chicago Perforating Co.
Chicago, Ill.
Erdle Perforating Co.
Rochester, N. Y.
Howes Co., S.
Silver Creek, N. Y.
Huntley Mfg. Co.
Brocton, N. Y.
Seed Trade Reporting Bureau
Chicago, Ill.
(See Adv. Index Page 178)

SEALS

Bates Valve Bag Corp.
Chicago, Ill.
(See Adv. Index Page 178)
Porter Safety Seal Co.
Chicago, Ill.
(See Adv. Index Page 178)

SEED CASES

Heller & Co., W. C.
Montpellier, Ohio
Lewis, G. B.
Watertown, Wis.
Walker Bin Co.
Penn Yan, N. Y.

SEED CLEANING

Kellogg Seed Co., John L.
Chicago, Ill.
(See Adv. Index Page 178)

SEED DRIERS

Ellis Drier Co.
Chicago, Ill.
Hess Warming & Ventilating Co.
Chicago, Ill.
Howes Co., S.
Silver Creek, N. Y.
Invincible Grain Cleaner Co.
Silver Creek, N. Y.
Martin Co., The
Des Moines, Ia.
Randolph Co., O. W.
Toledo, Ohio
Richards & Sons, Ross V.
North Manchester, Ind.

SEED ENVELOPE SEALERS

Stokes & Smith Co., The
Philadelphia, Pa.

SEED PACKETS

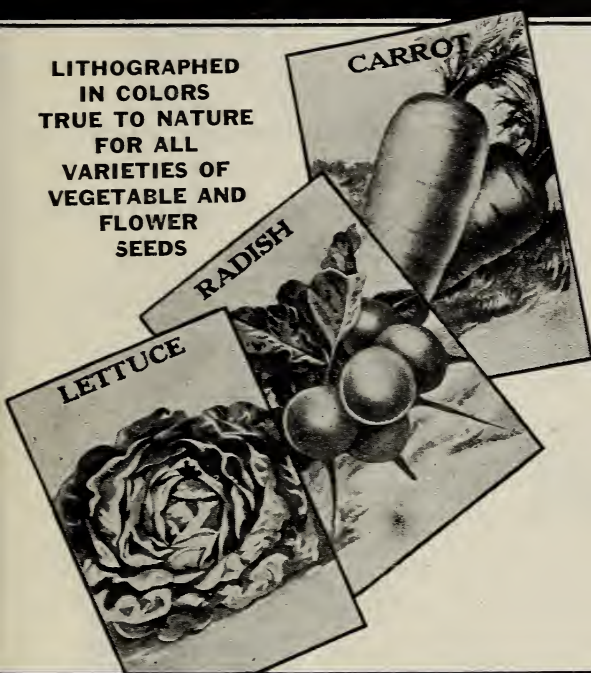
Brown Bag Filling Machine Co.
Fitchburg, Mass.
(See Adv. Index Page 178)
Galloway Lithographing Co.
San Francisco, Cal.
(See Adv. Index Page 178)
Genesee Valley Lithograph Co.
Rochester, N. Y.
(See Adv. Index Page 178)
Karle Lithographic Co.
Rochester, N. Y.
McFarland Co., J. Horace
Harrisburg, Pa.
Rochester Lithographing Co.
Rochester, N. Y.
Stecher Lithographic Co.
Rochester, N. Y.
(See Adv. Index Page 178)

SEED PACKET DISPLAY RACKS

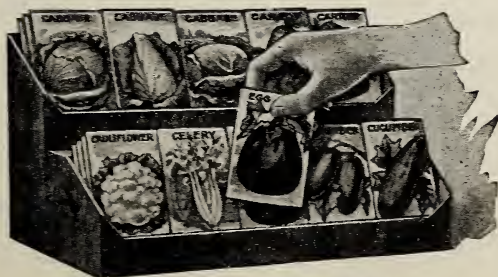
Davis Metal Fixture Co.
Lansing, Mich.
(See Adv. Index Page 178)
Hamilton Mfg. Co.
Two Rivers, Wis.

SEED PACKETS THAT SELL THE SEED

LITHOGRAPHED
IN COLORS
TRUE TO NATURE
FOR ALL
VARIETIES OF
VEGETABLE AND
FLOWER
SEEDS



We always have available for immediate shipment a large supply of different varieties of Seed Cartons, Lawn Grass Cartons and Bird Seed Cartons. We also make on special order Seed Catalogue covers, Seed Hangers, Seed Box Labels, etc.



Write for listing and quotations today

STECHER LITHOGRAPHIC COMPANY
ROCHESTER, N. Y.

SEEDSMEN'S SUPPLIES—Concluded

Seed Packet Display Racks—Continued

- Knickerbocker Case Co.**
Chicago, Ill.
(See Adv. Index Page 178)
- Manitowoc Building Supply Co.**
Manitowoc, Wis.
- Walker Bin Co.**
Penn Yan, N. Y.
- Webster Co., Mel. L.**
Independence, Iowa

SEED POLISHERS

- Goodner Pump & Mfg. Co.**
Rocky Ford, Colo.

SEED SAMPLE ENVELOPES

- Ames Bag Machine Co.**
Cleveland, Ohio
(See Adv. Index Page 178)
- Bemis Bro. Bag Co.**
St. Louis, Mo.
(See Adv. Index Page 178)
- Berkowitz Envelope Co.**
Kansas City, Mo.
(See Adv. Index Page 178)
- Heco Envelope Co.**
Chicago, Ill.
- Heinrich, Inc., John A.**
Minneapolis, Minn.
(See Adv. Index Page 178)
- Miller, Tompkins & Co.**
New York City, N. Y.
- National Bag Co.**
Naperville, Ill.
- Ontario Co.**
Chicago, Ill.
- Stecher Lithographic Co.**
Rochester, N. Y.
(See Adv. Index Page 178)
- Tension Envelope Co.**
Brooklyn, N. Y.
- Weaver Mailing Envelope & Box Co.**
Philadelphia, Pa.
- Western Envelope Co.**
Kansas City, Mo.

SEED THRESHERS

- Birdsell Mfg. Co.**
South Bend, Ind.
- Caledonia Bean Harvester Works**
Caledonia, N. Y.
- Case Threshing Machine Co., J. I.**
Racine, Wis.
- Goodner Pump & Mfg. Co.**
Rocky Ford, Colo.
- Gray's Sons, Inc., A. W.**
Poultney, Vt.
- International Harvester Co.**
Chicago, Ill.
- Koger Pea & Bean Thresher Co.**
Morristown, Tenn.
- Owens Co., J. L.**
Minneapolis, Minn.

SHIPPING TAGS

- American Tag Co.**
Chicago, Ill.
- Dennison Mfg. Co.**
Framington, Mass.
- International Tag Co.**
Chicago, Ill.
- Quality Print, Inc.**
Shelbyville, Ind.
- Quality Tag Works**
Franklin, Ind.

STORE FIXTURES

- Davis Metal Fixture Co.**
Lansing, Mich.
(See Adv. Index Page 178)
- Heller & Co., W. C.**
Montpelier, Ohio
- National Cash Register Co.**
Dayton, Ohio
- Walker Bin Co.**
Penn Yan, N. Y.

TAG ADDRESSING MACHINES

- Addressing Machine Co.**
Buffalo, N. Y.

TRADE MARK REGISTRATIONS

- Scheible, Albert**
Chicago, Ill.

TRUCKS

- Chase Foundry & Mfg. Co.**
Columbus, Ohio
- Edwards Mfg. Co.**
Cincinnati, Ohio
- Nutting Truck Co.**
Faribault, Minn.
- Steubing Truck Co.**
Cincinnati, Ohio

TWINE-SEWING AND TYING

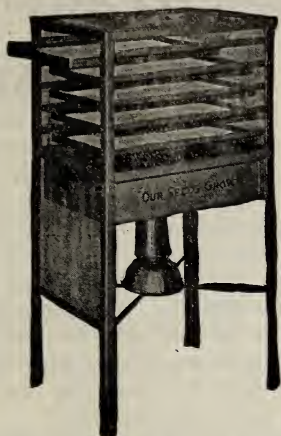
- Bemis Bro. Bag Co.**
St. Louis, Mo.
(See Adv. Index Page 178)
- Chase Bag Co.**
St. Louis, Mo.
- Messinger Paper Co.**
Chicago, Ill.
- Southern Cotton Mills Agency**
Baltimore, Md.
- Stone & Forsyth Co.**
Boston, Mass.

WRAPPING MACHINES—AUTO-MATIC

- American Machinery & Foundry Co.**
Brooklyn, N. Y.
- Ferguson Co., J. L.**
Joliet, Ill.

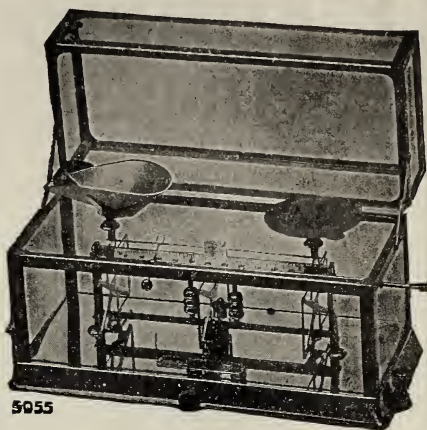
When writing for
Seed and Supplies be sure
and use **STICKERS**
on page 179

SEED TESTING EQUIPMENT



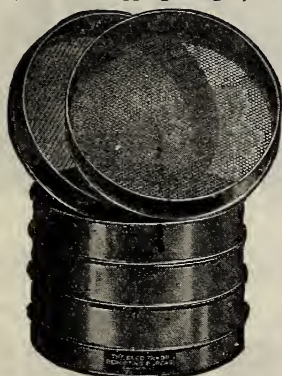
Sho-Gro Germinators

are Rapid—Reliable—Reasonable. Durable made with glass sides—it is efficient, accurate and makes an attractive display of sprouting seeds that will interest your customers. Blotters are kept moist by evaporation. Has 5 trays 10 x 15 in. Electric or lamp heat. Price with oil heat, \$23.00. Electric (100 or 220 volts), \$30.00. Shipping weight, 95 lbs.



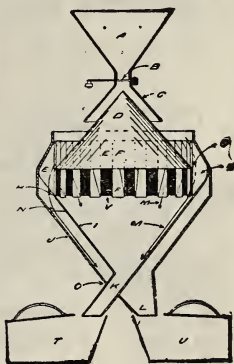
Torsion Scale No. 5055

A fine balance for delicate weighing and the analysis of seed and grain. Capacity 120 grams, sensitiveness 2 milligrams. Rider beam 1 gram by .01 gram or if specified, 500 milligrams by 5 milligrams. Size 13x8 1/4 x 6 1/2 inches. Brass weights in mahogany case 2-20 grams to 1 gram. Price, \$72.00.



Magnifying Glass with Eye Shade No. 43

This 3 in. glass and stand will be found very practical for examining grain and seed samples. The glass is held rigid on the stand and is easily adjusted to any angle or position. The eye shield is removable. Has heavy metal base, shipping weight, 4 lbs. Price, each, \$8.00.



Seed Dockage Sieves for Clovers, Timothy and other Seeds of Similar Sizes. These sieves are correctly made in every particular. The size of the perforations—the accuracy of the construction—the strength—material and workmanship are SEEDBURO quality throughout. The complete set consists of 6 sieves and solid bottom pan, as follows: Three of the sieves have zinc bottom, with round perforations in sizes—1/20, 1/15, 1/18. Three have woven wire meshes in sizes 6x24 and 6x32, 6x34. Price \$8.00 for complete set f. o. b. Chicago. Shipping weight 9 lbs.

The Boerner Sampler is of great benefit in securing reliable samples of seed. Mixes seed thoroughly and divides into two equal parts, securing as small a sample as is desired by repeated operation. No power required. Made of brass in exact accordance with Government specifications. Price \$35.00. Shipping weight 18 lbs.

Write for full descriptive matter on all seed testing equipment

SEED TRADE REPORTING BUREAU

1018 SOUTH WABASH AVENUE

CHICAGO, ILL.

ADVERTISING CUTS



CUT NO. 106B, SINGLE COL., \$1.00
CUT NO. 106, DOUBLE COL., \$1.25



I grow my own!

CUT NO. 103B, SINGLE COL., \$1.00
CUT NO. 103, DOUBLE COL., \$1.25



CUT NO. 111B, SINGLE COL., \$1.00
CUT NO. 111, DOUBLE COL., \$1.25

POULTRY



CUT NO. 113B, SINGLE COL., \$1.00
CUT NO. 113, DOUBLE COL., \$1.25

that get Attention
and
BRING TRADE

The accompanying are specimens of our syndicated cut service, for use by our readers in dressing up their newspaper advertising.

The cost of these cuts is small but the results gained by enhancing the pulling power of your advertising is great.

Pictures attract attention and as that is what you want here is your opportunity.

Cuts furnished in either one or two-column sizes.

Specify whether electros or mats.



CUT NO. 112B, SINGLE COL., \$1.00
CUT NO. 112, DOUBLE COL., \$1.25



CUT NO. 116B, SINGLE COL., \$1.00
CUT NO. 116, DOUBLE COL., \$1.25

ADVERTISING CUTS

PLANT IT NOW



CUT NO. 109B, SINGLE COL., \$1.00
CUT NO. 109, DOUBLE COL., \$1.25



NO. 108B, SINGLE COL., \$1.00
NO. 108, DOUBLE COL., \$1.25



SEND IN
YOUR ORDER
NOW!



ORDER BY NUMBER
FROM

SEED WORLD
1018 S. WABASH AVE.
CHICAGO, ILL.

SEEDS



* CUT NO. 114B, SINGLE COL., \$1.00
CUT NO. 114, DOUBLE COL., \$1.25



As You Sow

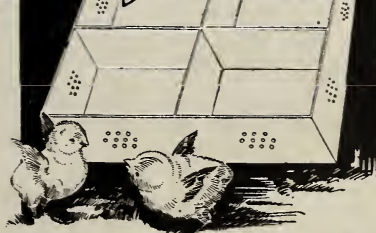
SINGLE COL., \$1.00
CUT NO. 105, DOUBLE COL., \$1.25



Plant A Garden

CUT NO. 110B, SINGLE COL., \$1.00
CUT NO. 110, DOUBLE COL., \$1.25

Baby Chicks



CUT NO. 107B, SINGLE COL., \$1.00
CUT NO. 107, DOUBLE COL., \$1.25

ADVERTISERS' INDEX

- Ackerman Company, The... 51
 Aggeler & Musser Seed Co. 71
 American Brooder Corp... 151
 American Bulb Co... 95
 American Fork & Hoe Co. 135
 American Thermo-Ware Co., Inc. 143
 Ames Bag Machine Co... 163
 Amtorg Trading Corp. 37
 Appel Comm. Co., C. H. 111

 Barnard Co., The W. W. ... 75
 Bartlett Mfg. Co. 131
 Battle Creek Dog Food Co. 145
 Bayer-Semesan Co., Inc. 157
 Bemis Bro. Bag Co. 165
 Benary, Ernest 91
 Benno Fiegel, A.-G. 59
 Berkowitz Envelope Co. 169
 Bertrand Seed Co. 71
 Bird & Son, Inc. 139
 Blamberg Bros., Inc. 45
 Bodger & Sons Co., John 84, 85
 Bowman Seed Co., The... 13
 Braslan Seed Growers Co., Inc. 81
 Brown Co., The E. C. 1
 Brown Bag Filling Machine Co., The 122
 Brown Seed Co., Alfred J. ... 7
 Bruce & Co., Ltd., John A. ... 33
 Buist Co., Robert. 67
 Burpee Co., W. Atlee. 33

 C-A Wood Preserver Co. 147
 California Spray-Chemical Co. 133
 Campbell Printing Co. 167
 Clark & Sons, C. S. 107
 Clark & Son, Walter E. 101
 Cleveland Buckram & Bag Co., The 139
 Coe Seed & Grain Co., D. O. ... 45
 Comstock, Ferre & Co. 73
 Condon Bros., Seedsmen... 75
 Corneli Seed Co. 15, 47
 Coy Seed Co., Inc., The C. Herbert 65
 Crescent Co., The. 147
 Crooks Terminal Warehouses 111

 Dacotah Seed Co. 49
 Danish Seed Growers Sales Co., Inc. 67
 Davenport Seed Co. 45
 Davis Metal Fixture Co. 169
 Dee and Ess Co. 131
 Diamond Rubber Co. 103
 Dobbins Mfg. Co., The. 161
 Douglas Chem. & Supply Co. 149

 Eastern Counties Farmers Co-op. Assn., Ltd. 57
 Edwards Laboratory, The. 117
 Eikenberry Bros. Co., The. 49
 Ellis, Mrs. Merton G. 89
 Fargo Seed House. 49
 Farmer Seed & Nursery Co. 55
 Fekete Brothers 61
 Fish, Henry Berrien. 73
 Fish Seed Co., Henry. 81
 Forrest Seed Co. 69
 Frederick Seed Co. 109

 Galloway Lithographing Co. 165
 Genesee Valley Lithograph Co. 167
 Germain Seed & Plant Co. 133
 Grain World 137
 Grand Junction Seed Co., The 73

 Griswold Seed & Nursery Co. 47
 Guicke, Rudolph 59
 Gulf Crushing Co. 143

 Haley-Neeley Co. 21
 Hall Seed Co. 15
 Hamilton Seed & Coal Co. ... 53
 Hansen, A. 61-93
 Hart Seed Co., Chas. C. 81
 Harvey Seed Co. 77
 Haven Seed Co. 70
 Henderson & Co., Peter. 131
 Heinrich Co., Inc., John A. 17
 Herbst Brothers 52
 Hillsdon-Watts, Ltd. 57
 Hirsch & Sons, Henry. 25
 Hoeft & Co., Inc. 113
 Hogue-Kellogg Co., The. 8
 Hollenbach, Peter. 101
 Howard Rose Co. 101
 Hudson Mfg. Co. 18
 Hurff, Edgar F. 69

 Idaho Grimm Alfalfa Seed Growers Assn. 31
 International Paper Co. 42-43
 International Seed Testing Labr. 169
 Interstate Seed & Grain Co. 55
 Ireland, Z. Jay. 97
 Isbell Seed Co. 75

 Kearns Grain & Seed Co. ... 51
 Kellogg Seed Co., John L., Back Cover
 Kelway & Son. 91
 King & Co., Ltd., E. W. 57
 King & Sons, Inc., H. C. 45
 Knickerbocker Case Co. 171

 Lagomarsino & Sons, F. 13
 Landreth Seed Co., D. 3
 Lawler, Geo. 97
 Leonard Seed Co. 4
 Leonard & Son, A. M. 137
 Lilly Co., The Chas. H. 53
 Loechner & Co., Inc. 9
 Loewith, Inc., Julius. 31
 Long Emulsion Co. 117
 Lupton & Son, J. M. Front Cover

 McCormick & Co., Inc. 159
 McCullough's Sons Co., J. M. 27
 McGill Seed Co., R. C. 73
 McHutchison & Co. 63
 McQueen Bacteria Co., The. 117
 MacDonald Seed Co., The Wm. 89
 McLaughlin Gormley King Co. 159
 Magill & Co. 49
 Mangelsdorf & Bro., Ed. F. 47
 Manshu Nosan Shokai, Inc. 91
 Market Gardeners Seed Co. 77
 Mauthner, Edmund 61
 Michigan Wire Goods Co. 145
 Miller & Co., Albert. 107
 Minneapolis Seed Co. 47
 Morris Grain & Seed Co. ... 29
 Morrow Seed Co., Ltd. 39
 Morse & Co., C. C. 9
 Mulford Co., H. K. 104
 Myers & Bro. Co., The F. E. 125

 Naperville Nurseries 99
 "Nasiona" 57
 Natural Guano Co. 129
 Nishna Valley Seed Co. 109
 Nitragin Co., The. 121
 Northrup, King & Co. 29

 O. & M. Seed Co. 49
 Ohlsens-Enke, J. E. 91
 Ouren Seed Co. 55

 Pacific Manure & Fertilizer Co. 143
 Page Seed Co., The. 69
 Pedrick & Son, Geo. R. 67
 Peerless Dust Gun Co. 143
 Peppard Seed Co., J. G. Inside Back Cover
 Philadelphia Seed Co., The. 53
 Pieters-Wheeler Seed Co. ... 79
 Pincus, J. W. 111
 Plant Products Co. 139
 Porter Safety Seal Co. 163
 Premier Poultry Manure Co. 126
 Pulverized Manure Co., The. 129

 Quisenberry-Hobbs Co. 115

 Radwaner Seed Co., Inc., I. L. 111
 Reardon Laboratories, Inc., W. G. 95
 Rice Seed Co., Jerome B. ... 77
 Robinson Seed Co., J. C. ... 79
 Rogers Bros. Seed Co. 86
 Rohmert, Waldo 65
 Rubio, Ernesto 93
 Rudy-Patrick Seed Co. 29

 Salina Produce Co., The. 55
 Schell, Inc., Walter S. 51
 Seaboard Seed Co. 51
 Sedgwick Alfalfa Mills, The 21
 Seed Trade Reporting Bureau. 63, 69, 133, 151, 159, 167, 173
 Shedaker & Son, B. D. 65
 Shepard Laboratories 139
 Simon & Son, I. N. 78
 Simplex Brooder Stove Co. 147
 Sioux City Seed Co. 67
 Smith & Co., D. B. Inside Front Cover
 Spears & Sons, Woodford. 27
 Spears-Kiser Co. 21
 Standard Seed Farms Co. ... 71
 Stecher Lithographic Co. 173
 Steele-Briggs Seed Co., Ltd. 31
 Stimulant Laboratories, Inc. 119
 Stumpp & Walter Co. 97
 Suhr Co., E. 93
 Sullivan, J. G. 83
 Swift & Co. 127
 Synthetic Nitrogen Products Corp. 126

 Taylor, Seedsman, Inc., H. M. 81
 Tezier Freres 63
 Tobacco By-Products & Chem. Corp. 153
 Troemner, Henry 171
 Universal Hoist & Mfg. Co. 109
 Urbana Laboratories, The. 120
 Van Antwerp's Seed Store. 39
 Virginia-Carolina Chemical Corp. 141
 Vollstadt, W. A. 107

 Waconia Sorghum Mills, Inc. 59
 Waller-Franklin Seed Co. ... 89
 Ward Seed Co., Wm. A. 39
 Washburn-Wilson Seed Co. 25
 Webb & Sons, Ltd., Edward 39
 Wertz Seed Co. 53
 Wilson, Jas. S. 15
 Wilson, Inc., Andrew. 155
 Woodruff & Sons, S. D. 101

KNOWN
ORIGIN

ALFA
SWEET CLOVER
BLUE GRASS

SUDAN
AND OTHER
FIELD SEEDS

CARLOTS
AND LESS

J. G. PEPPARD SEED CO.
KANSAS CITY MISSOURI



Seeds

We specialize in hardy, adapted, northern Clovers, and Mammoth Clover, Idaho and Minnesota Grown, free from buckhorn, thistle and dodder.

Our northern grown Alfalfas are all U. S. Verified as to origin.

We would be pleased to quote you also on Alsike, Sweet Clover, Timothy and Red Top.

Ask for our samples and quotations when in the market

CAR LOTS OR LESS
Mixed cars a specialty

"We make good seeds better"



JOHN KELLOGG SEED CO.

526 W. 18th Street

Phone Roosevelt 5367

CHICAGO, ILLINOIS